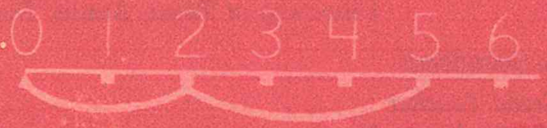

DISCOVERING MATHEMATICS

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MERRILL MATHEMATICS SERIES · ELEMENTARY–HIGH SCHOOL

DISCOVERING MATHEMATICS 1

M. Vere De Vault
Professor of Education
University of Wisconsin, Madison, Wisconsin

Roger Osborn
Associate Professor of Mathematics
University of Texas, Austin, Texas

Helen B. Swenson
Primary Grade Teacher
Austin Public Schools, Austin, Texas

TO THE TEACHER

The following is the general teaching plan and procedure developed in the Teacher's Guide:

Purpose of Page

The teaching goals of the lesson are stated at the beginning of each teacher's page.

Key Words and Phrases

Thorough learning of mathematical words and phrases that are basic to the pupil's understanding is emphasized. The suggested leading questions for the teacher's use are carefully phrased to include these key words and phrases.

Teaching Materials and Pupil Materials

In the typical classroom, chalkboard, pencils, and paper are usually available. Any special materials needed in presenting the lesson are listed.

Background for Teaching

Features of readiness lessons are described. Notations that may contribute to an understanding of terms used in contemporary mathematics are also included.

Preparatory Activities

Techniques that recall previous learning and extend it to a new concept or skill are given. Teacher-directed discussion and activities prepare the class for the exercises. They show the correct and appropriate use of key words and phrases. They incorporate the educational principles of discovery and active pupil participation.

Using This Page

Exercises are planned to provide the pupils with mathematical understanding and to teach the vocabulary necessary to express this understanding. Lessons are often reinforced by a suggested class discussion following completion of the exercises.

Supplementary Activities and Enrichment

Activities are suggested that will give practice in mathematical skills. These activities may vary from a review of a previously learned concept to an evaluation of what the child has learned in the new lesson.

Reinforcement of Learning

Suggestions are given that recall or review concepts presented earlier.

Evaluating Achievement

Following each unit are pages devoted to evaluation. They give a recapitulation of material in the preceding unit, including the specific mathematical concepts that were developed. The pages may be used to determine whether the pupils are prepared to continue with the following unit of work.

DISCOVERING MATHEMATICS

Discovering Mathematics is built upon the results of recent significant research. These modern developments have contributed greatly to a more thorough understanding of mathematical structure. The elements of conventional arithmetic that are mathematically and educationally sound form the basis of the program. Discovering Mathematics successfully blends tradition and innovation into a unified program for teaching contemporary mathematics.

FEATURES OF GRADE ONE PROGRAM

- Set Ideas and Terminology
- Number–Numeral Understanding
- Use of the Number Line
- Cardinal–Ordinal Relation
- Commutative Property of Addition
- Relation of Subtraction to Addition
- The Open Sentence
- Concepts of Place Value
- Introduction to Geometry
- Nongeometric Measurement
- Introduction to Fractions
- Word Problems

Diagnostic Inventory Space is provided for the teacher to record the progress of individual pupils following pages 4, 12, 20, 28, 36, 44, 52, 60, 68, 76, 84, 92, 100, 108, 116, 124, 132, 140, 148, 156.

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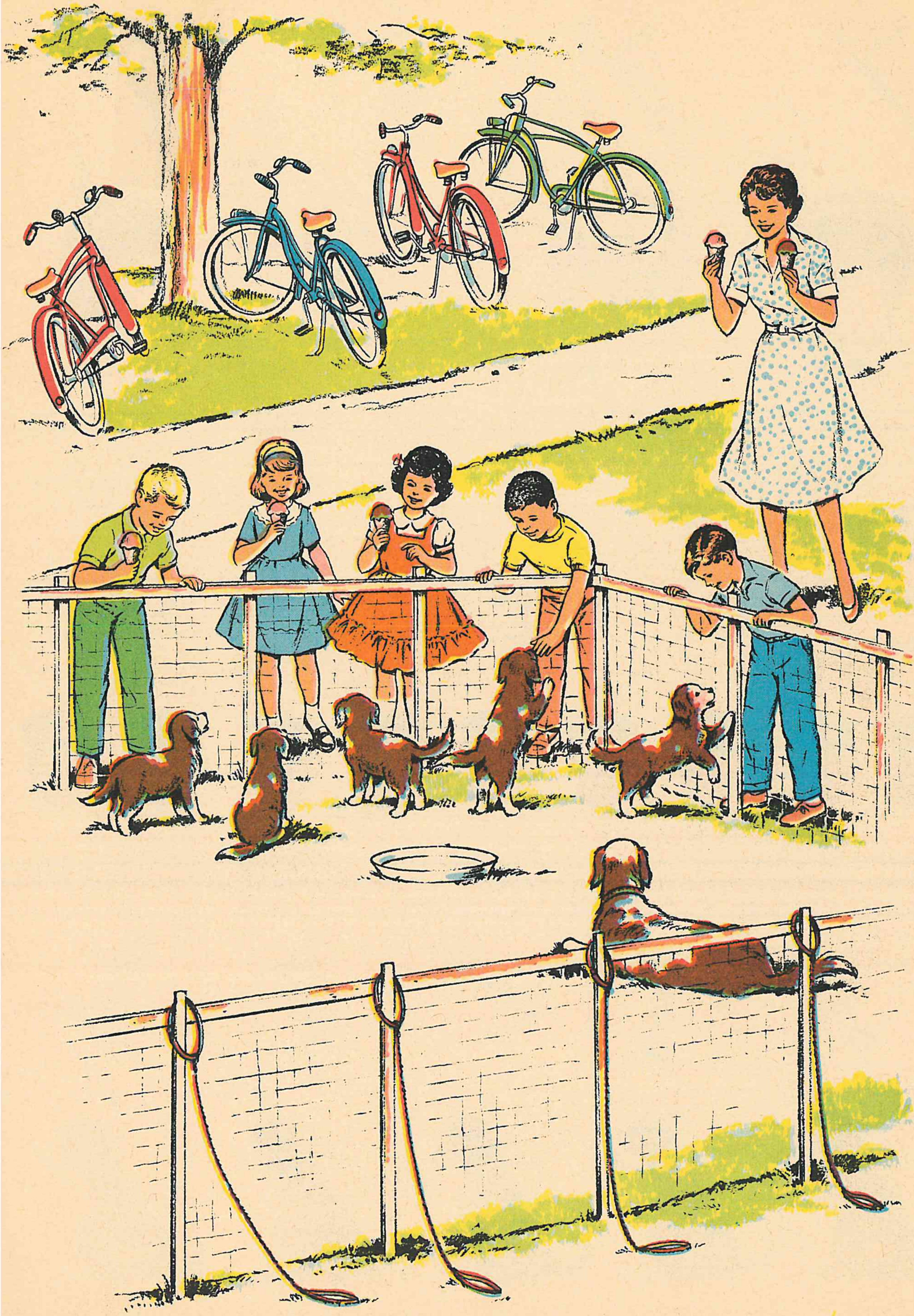

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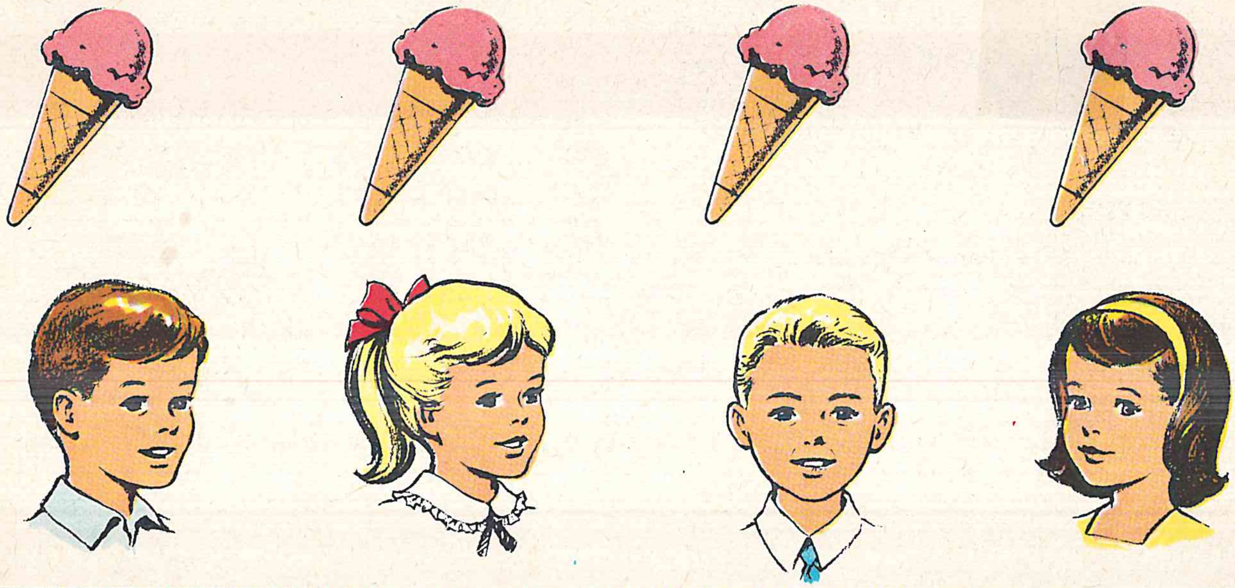

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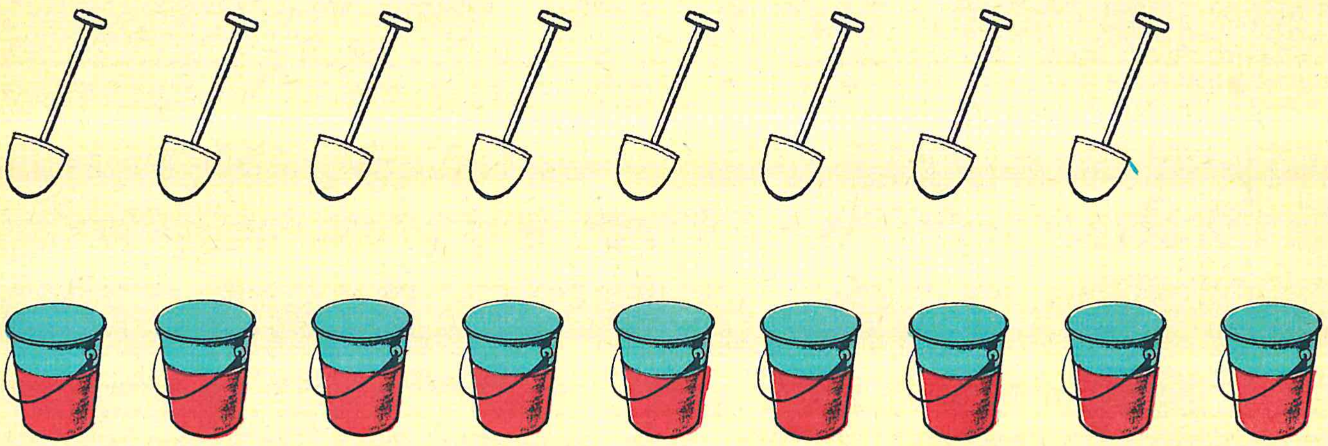

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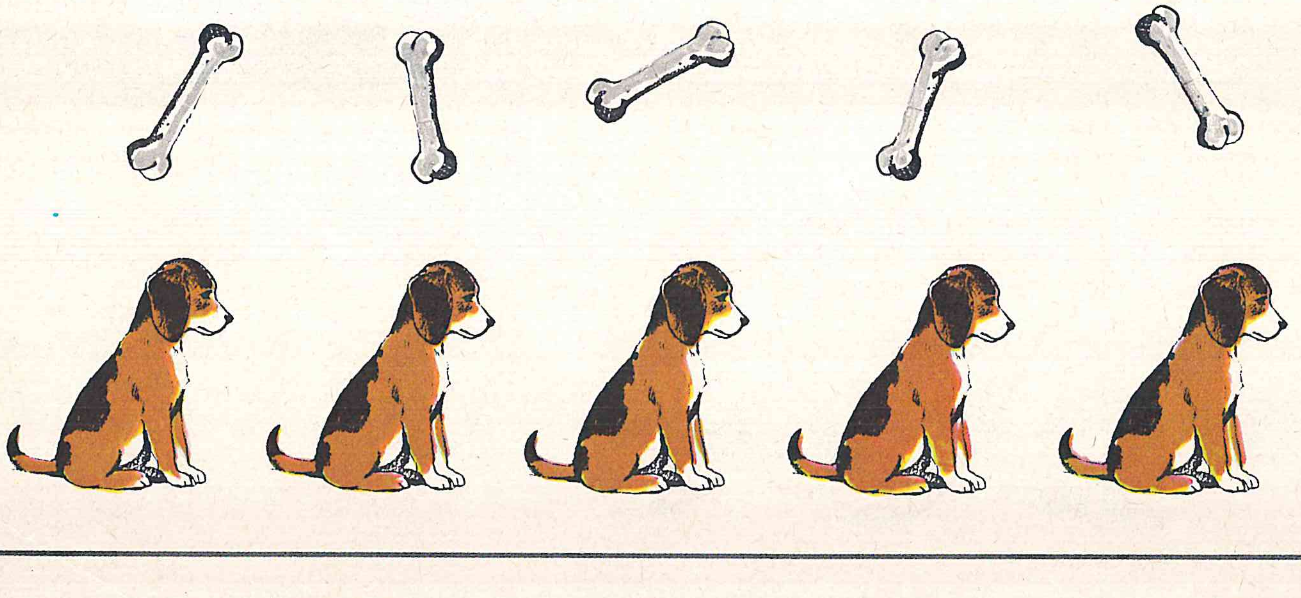

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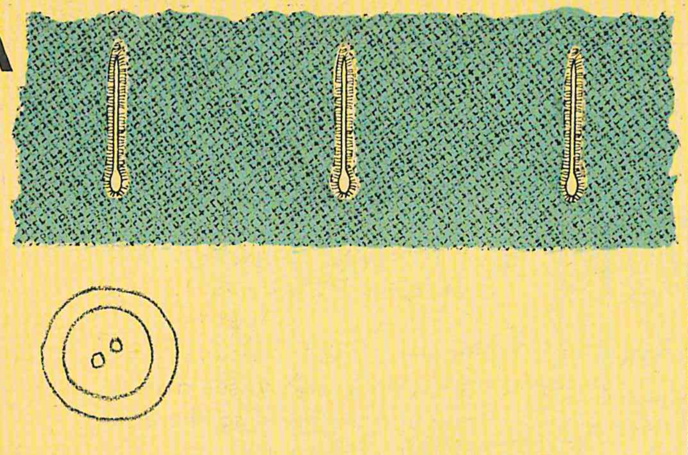

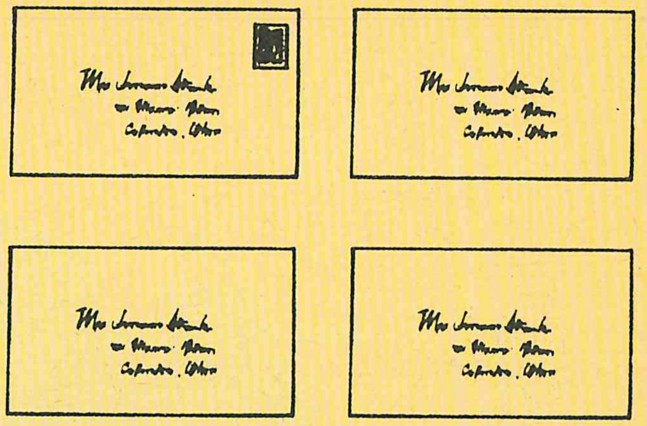

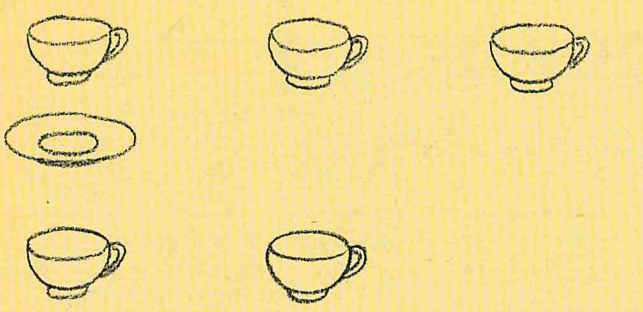

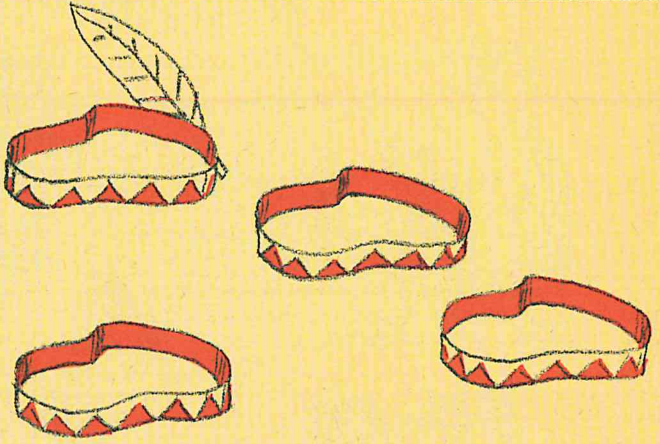

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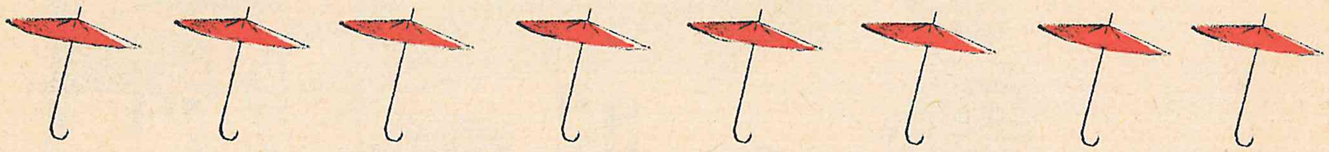

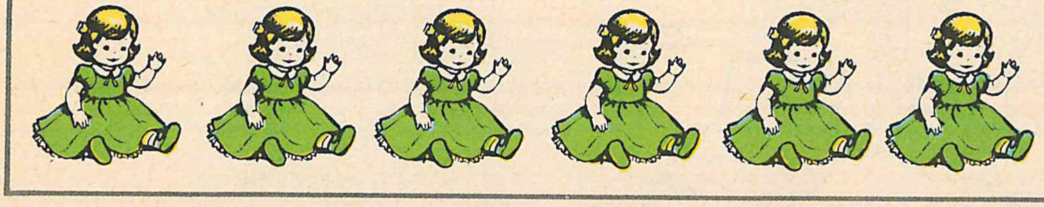

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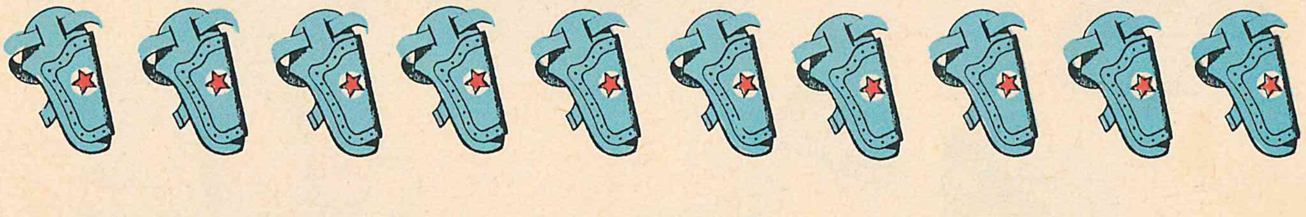

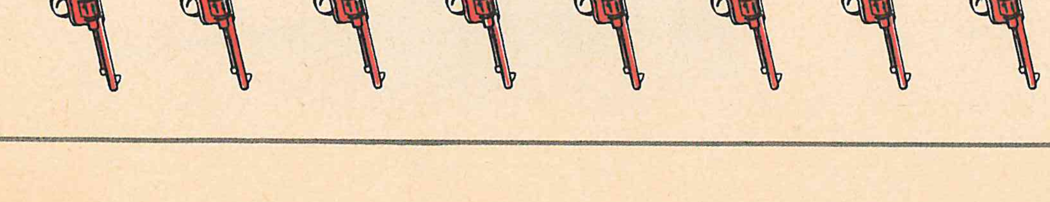

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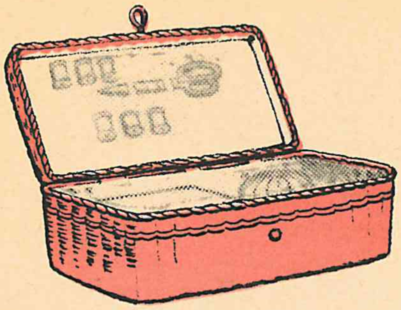
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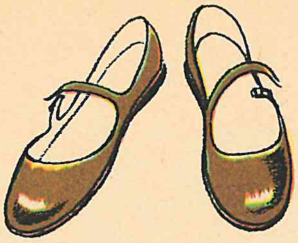
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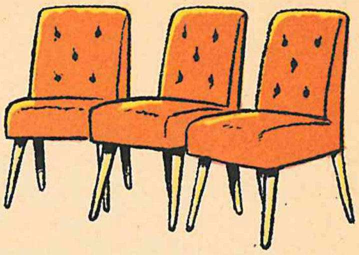
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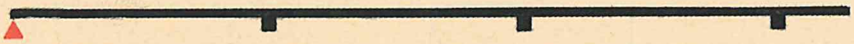

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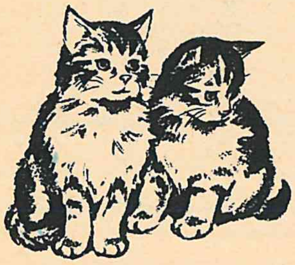
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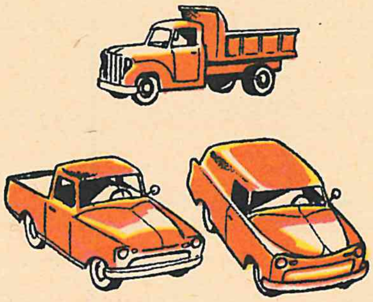
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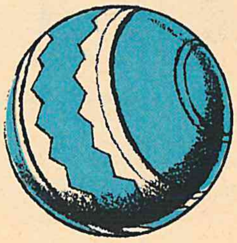
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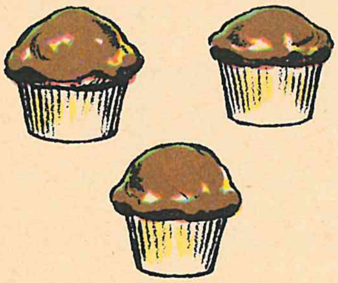
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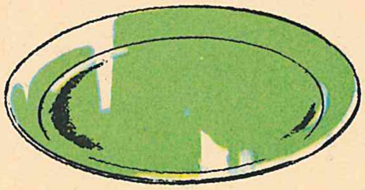
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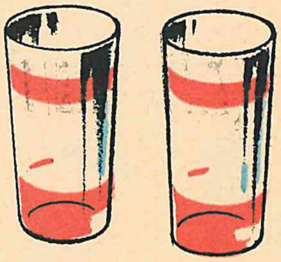
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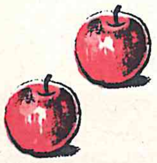	2	2		2		
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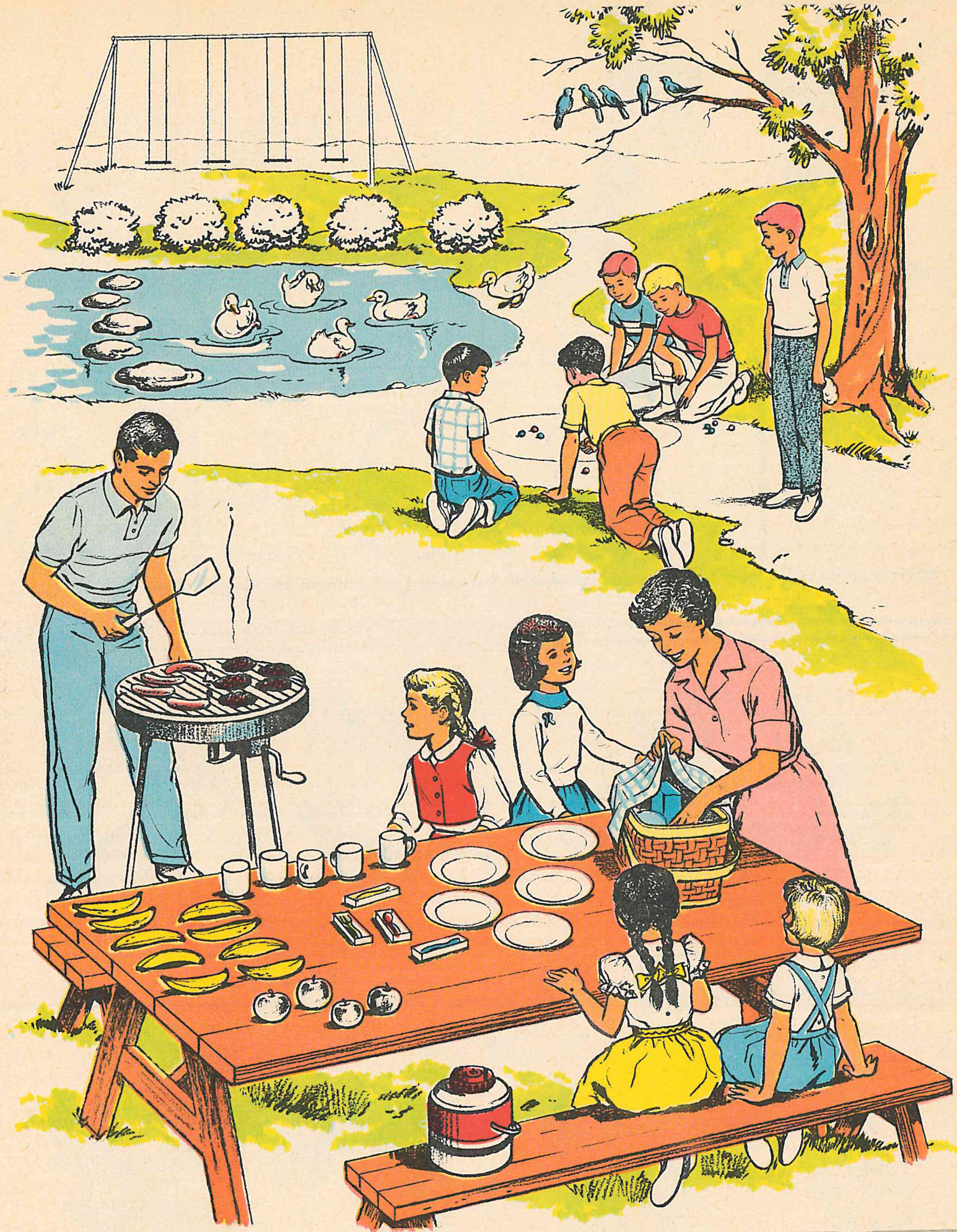

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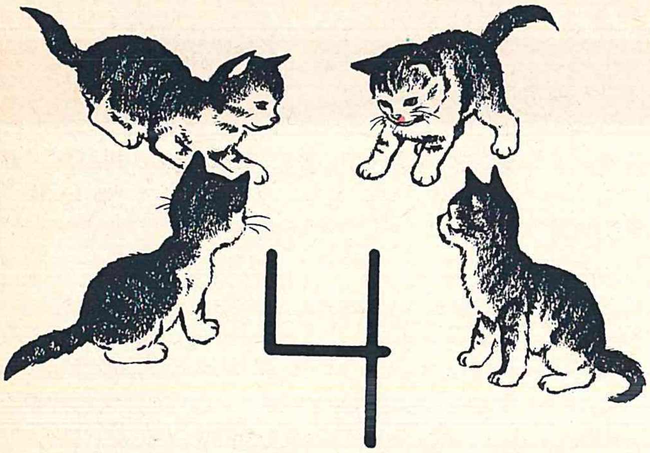

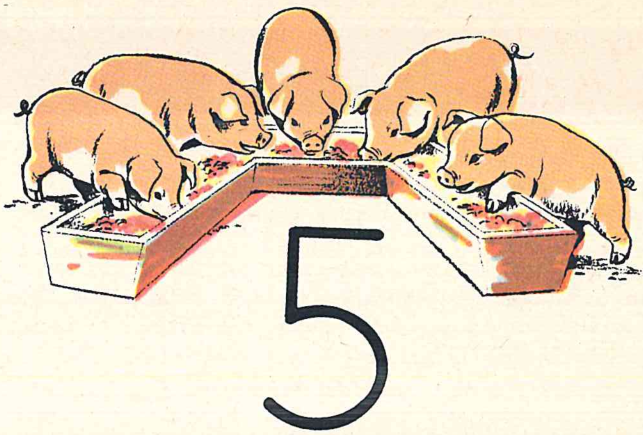

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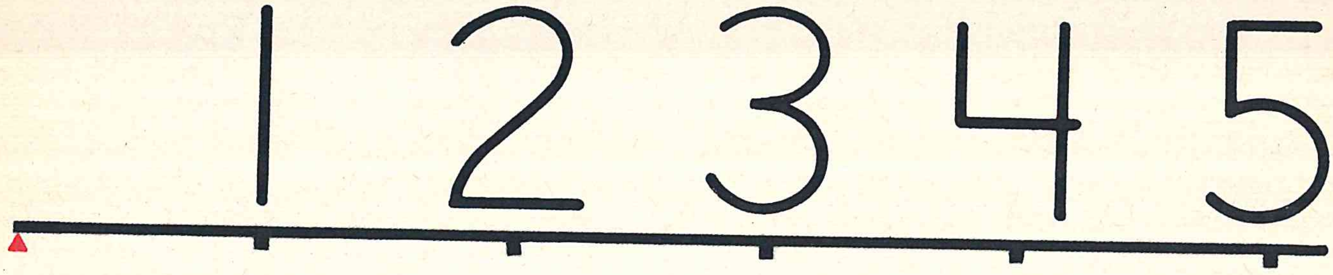

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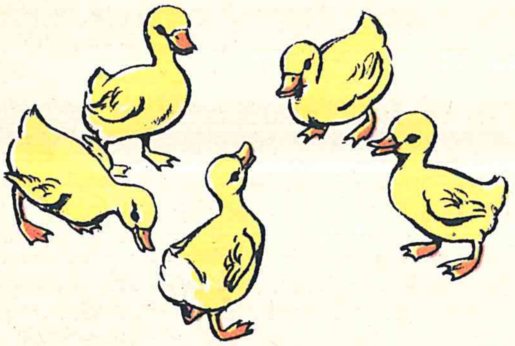

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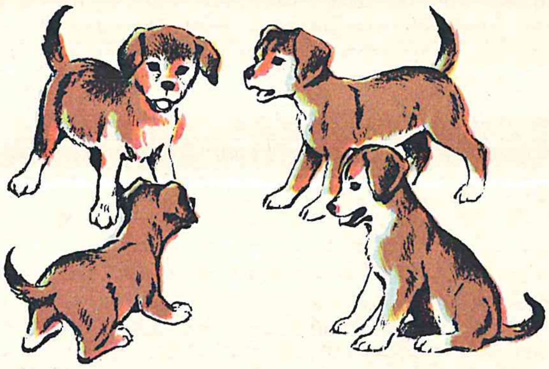

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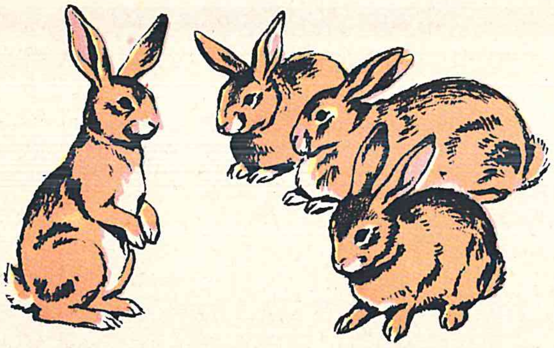

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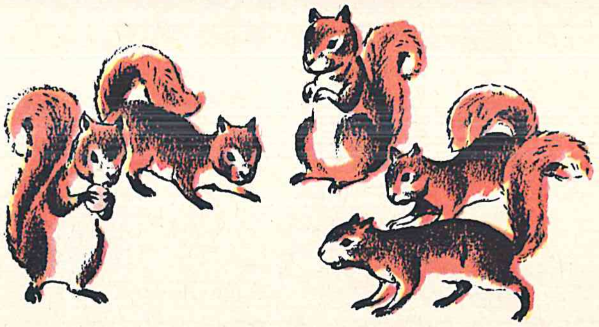

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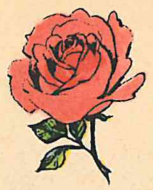

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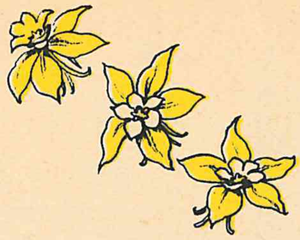

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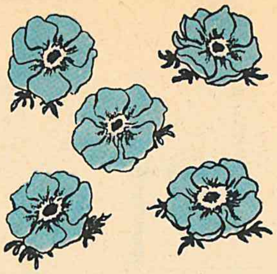

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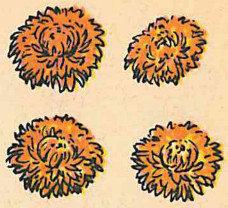

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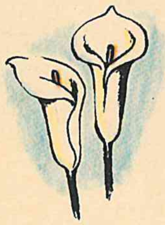

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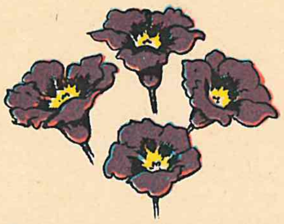

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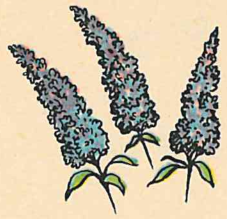

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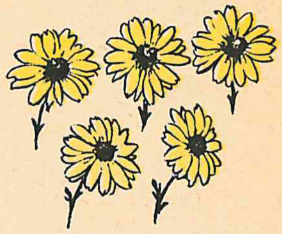

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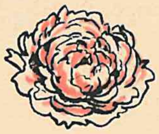

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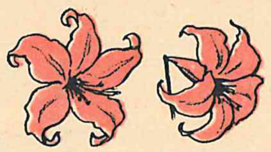

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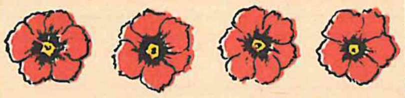

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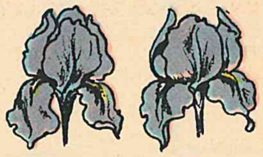

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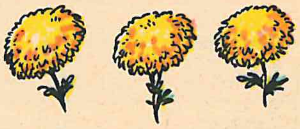

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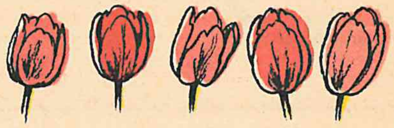

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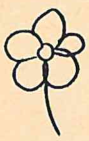

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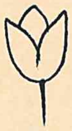

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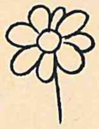

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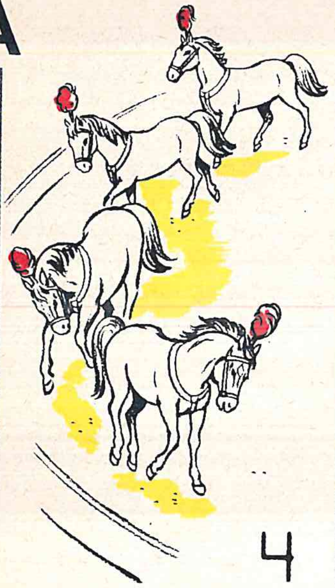

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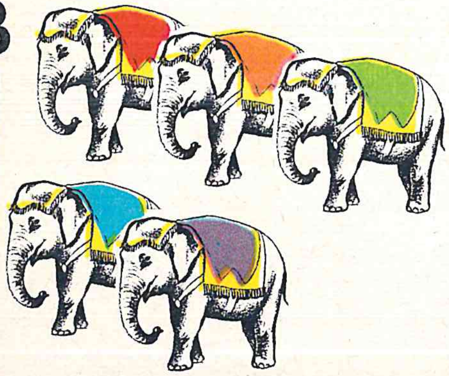

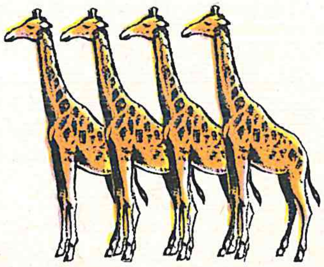

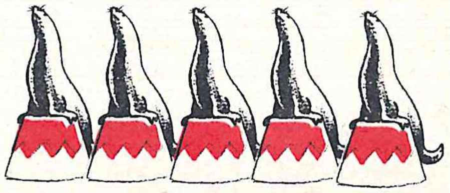

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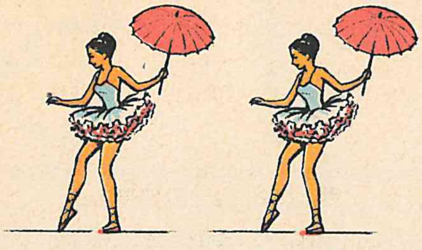

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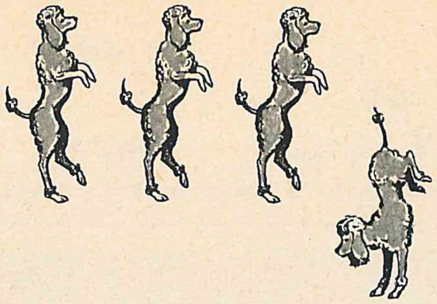

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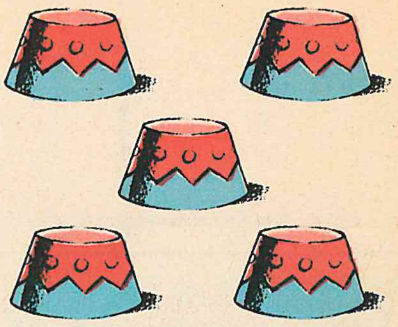

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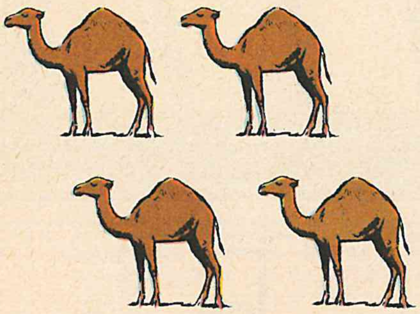

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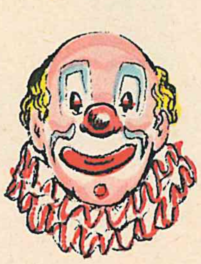

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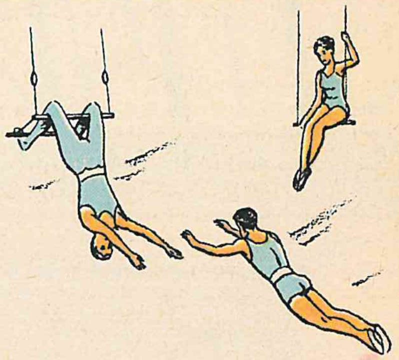

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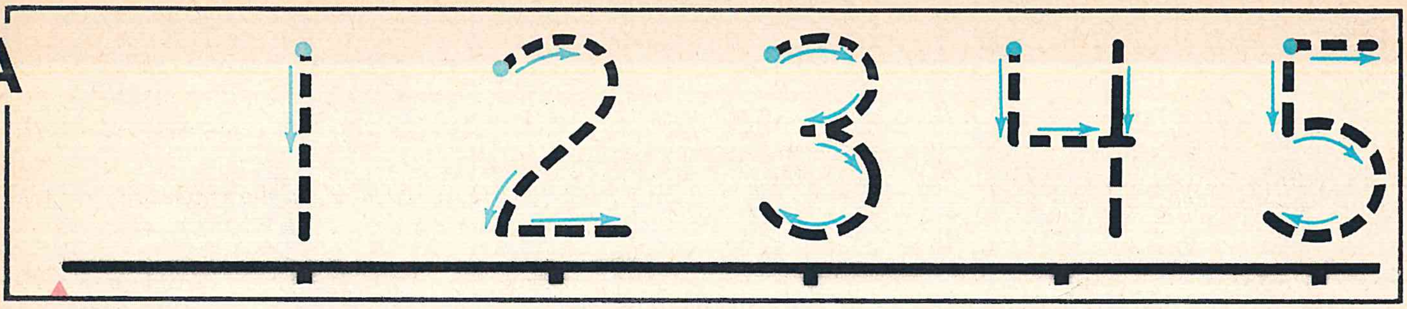

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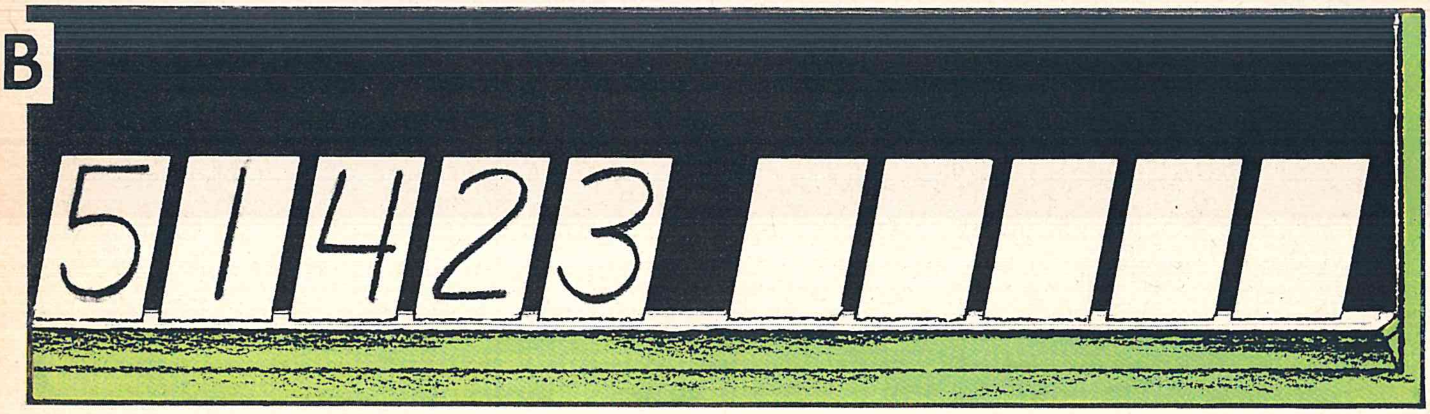

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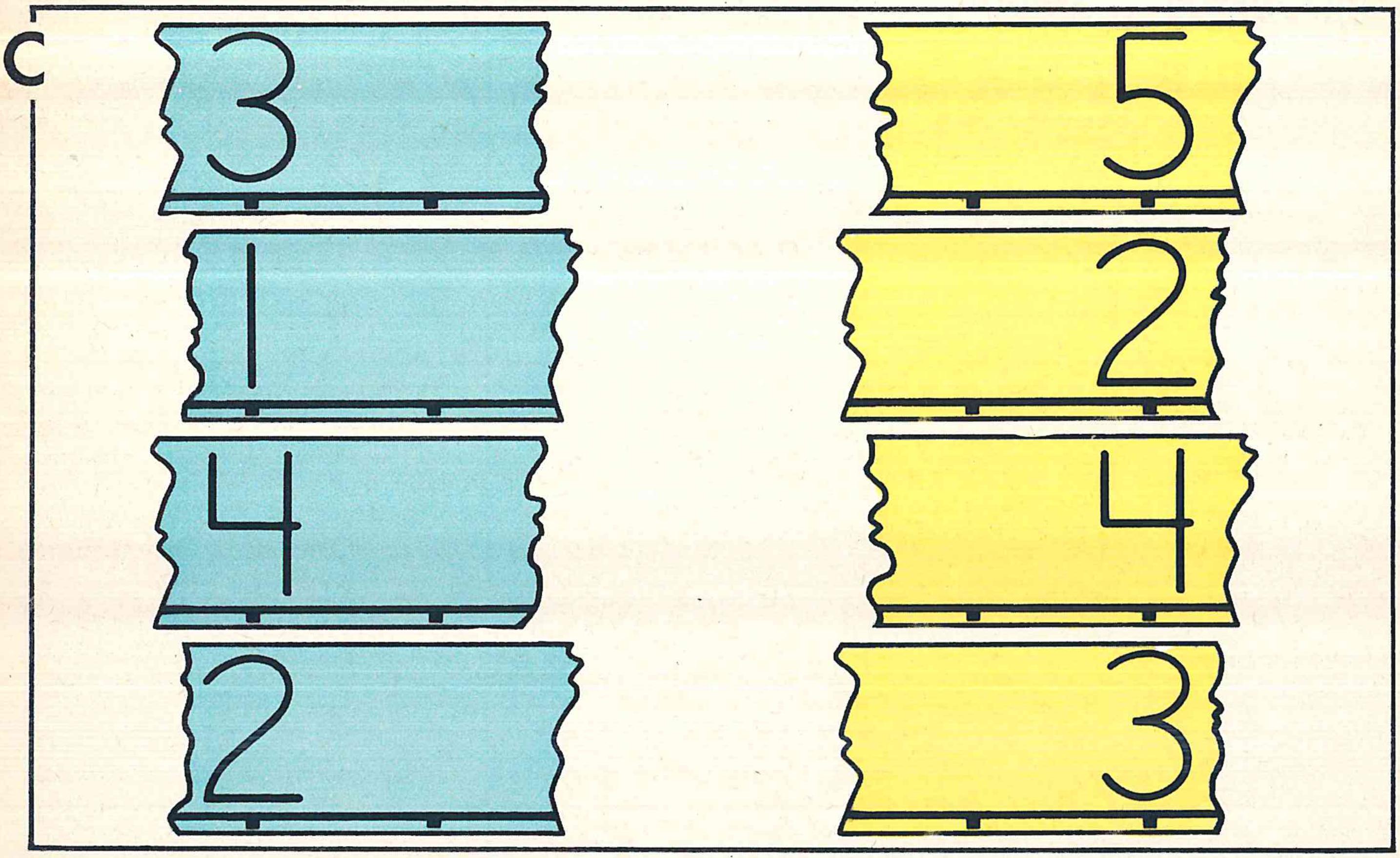

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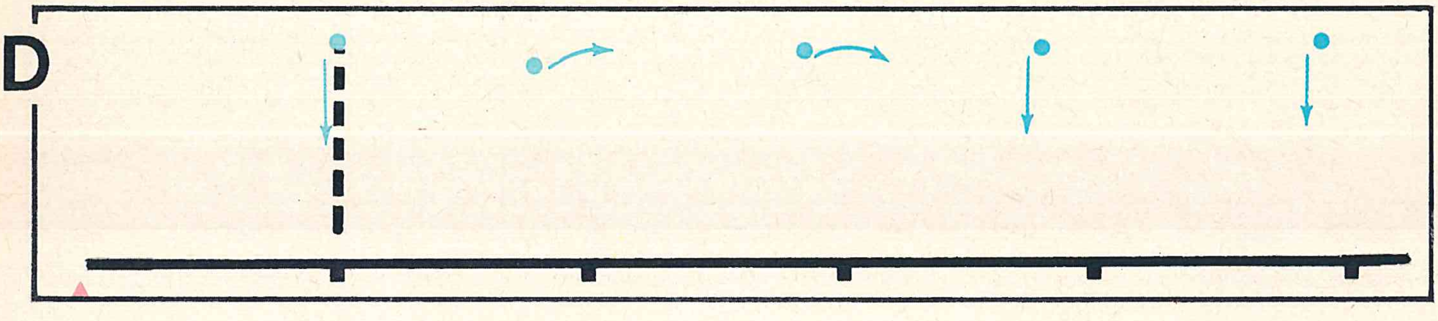

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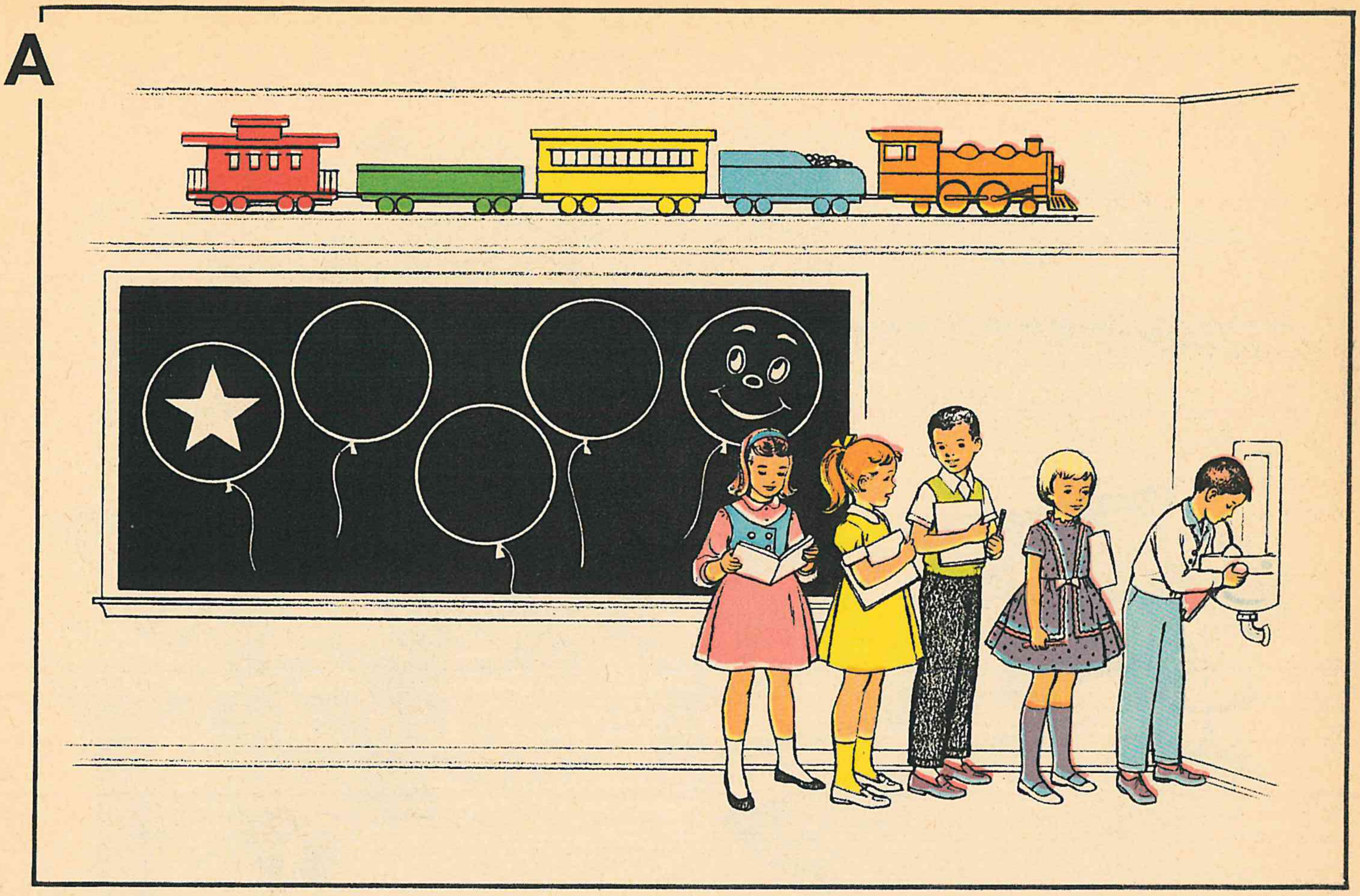

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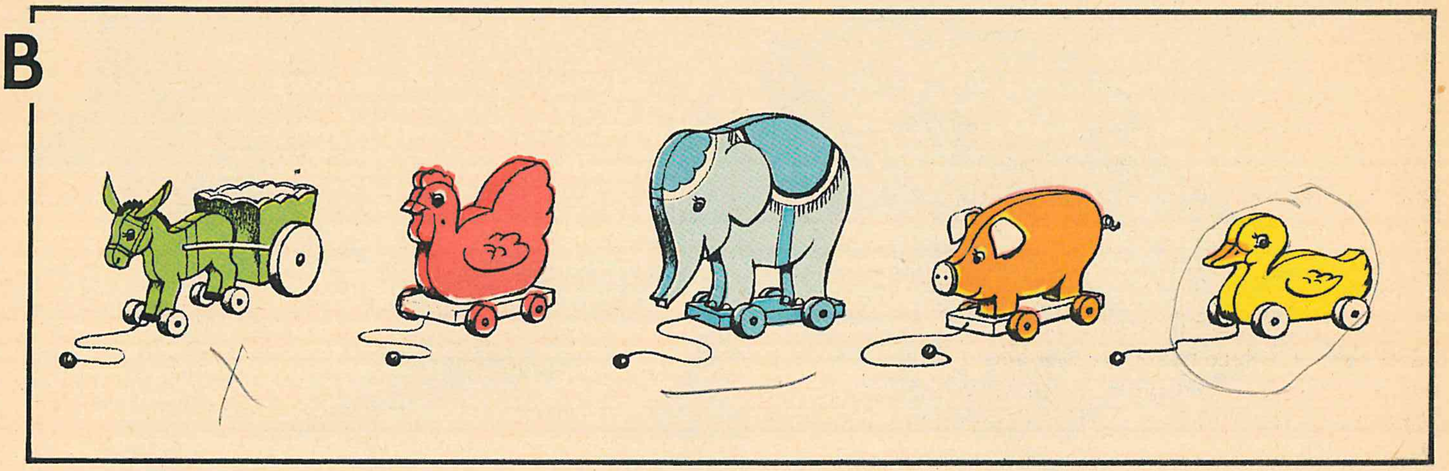

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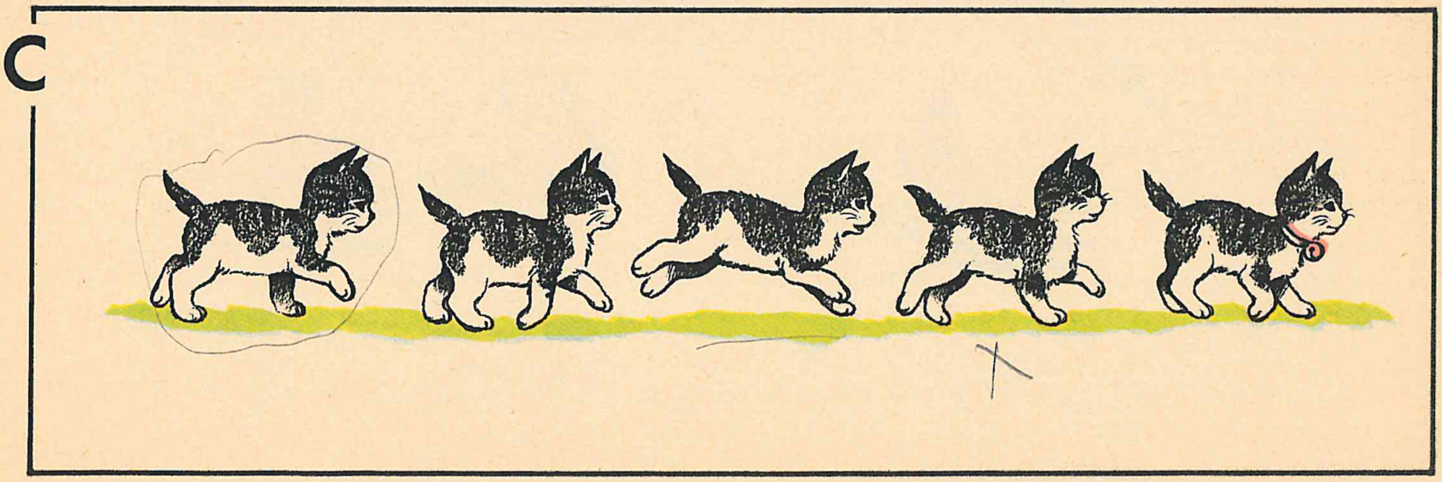

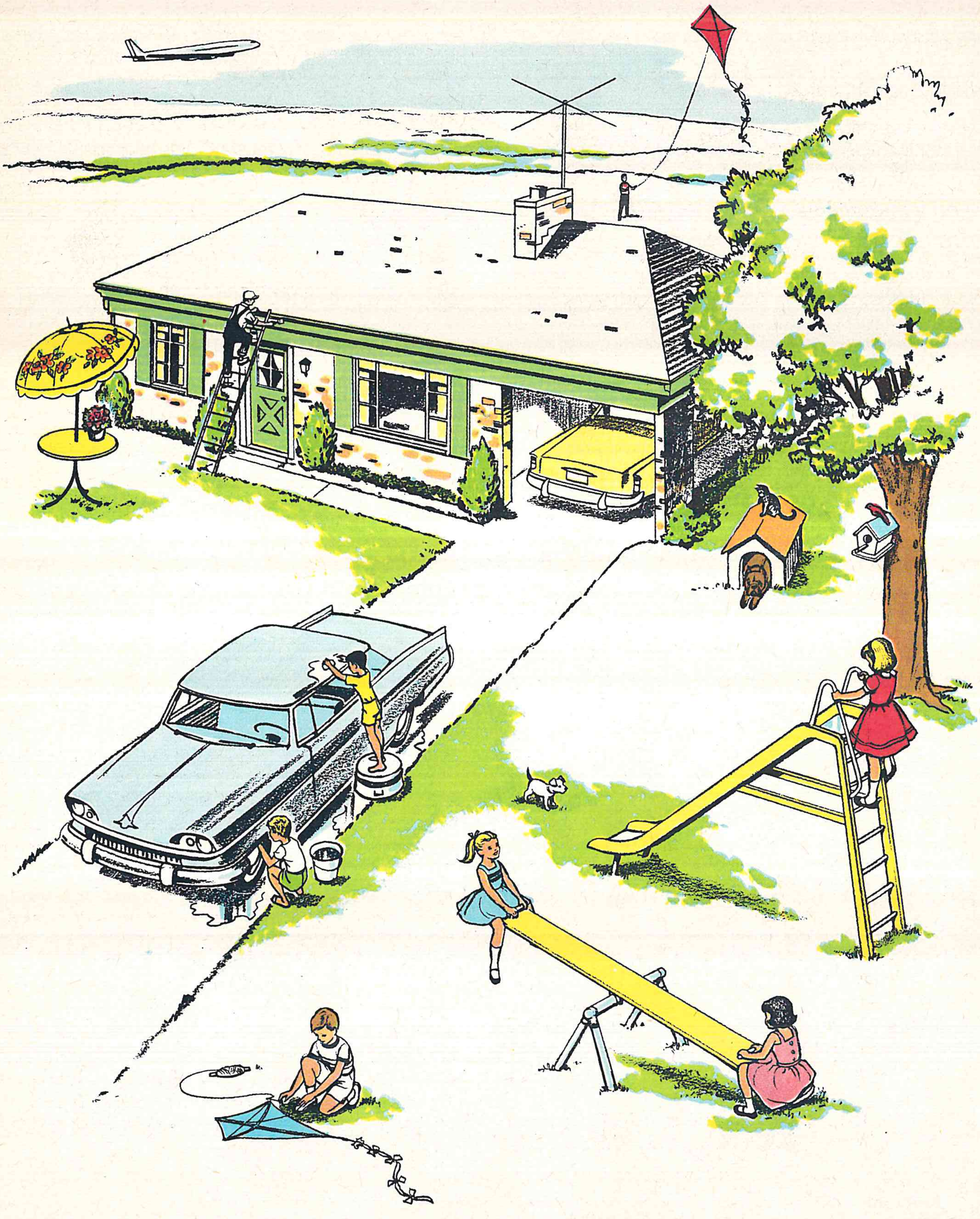

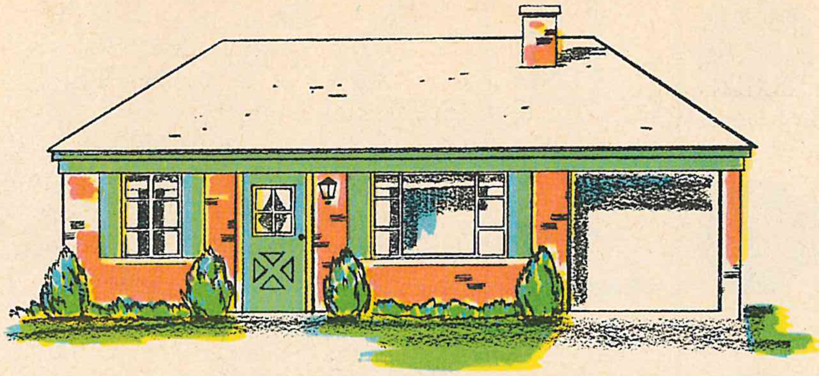

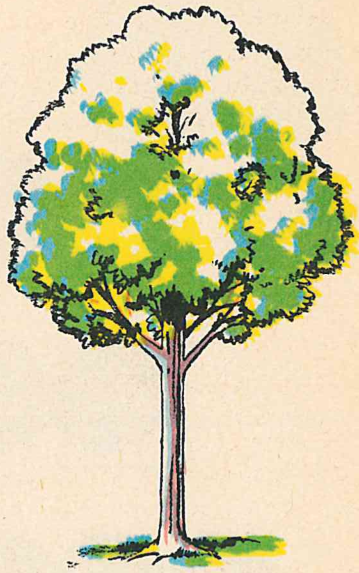

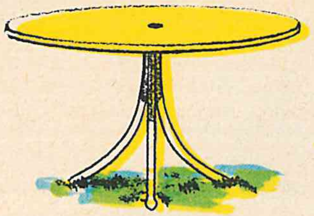

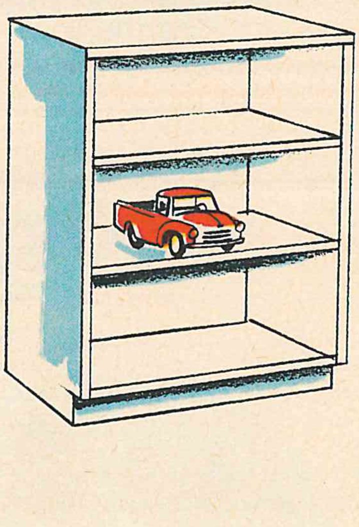

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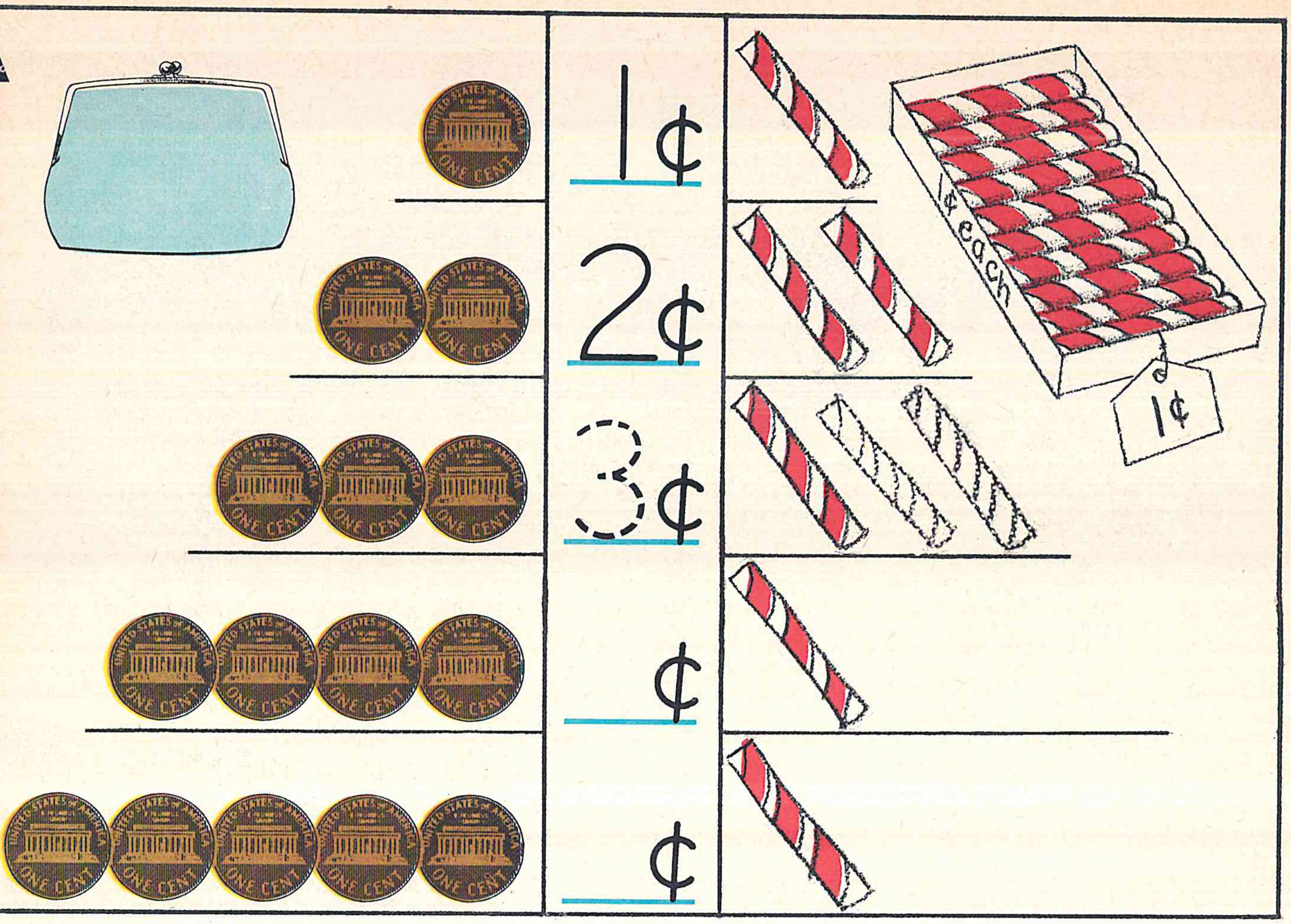

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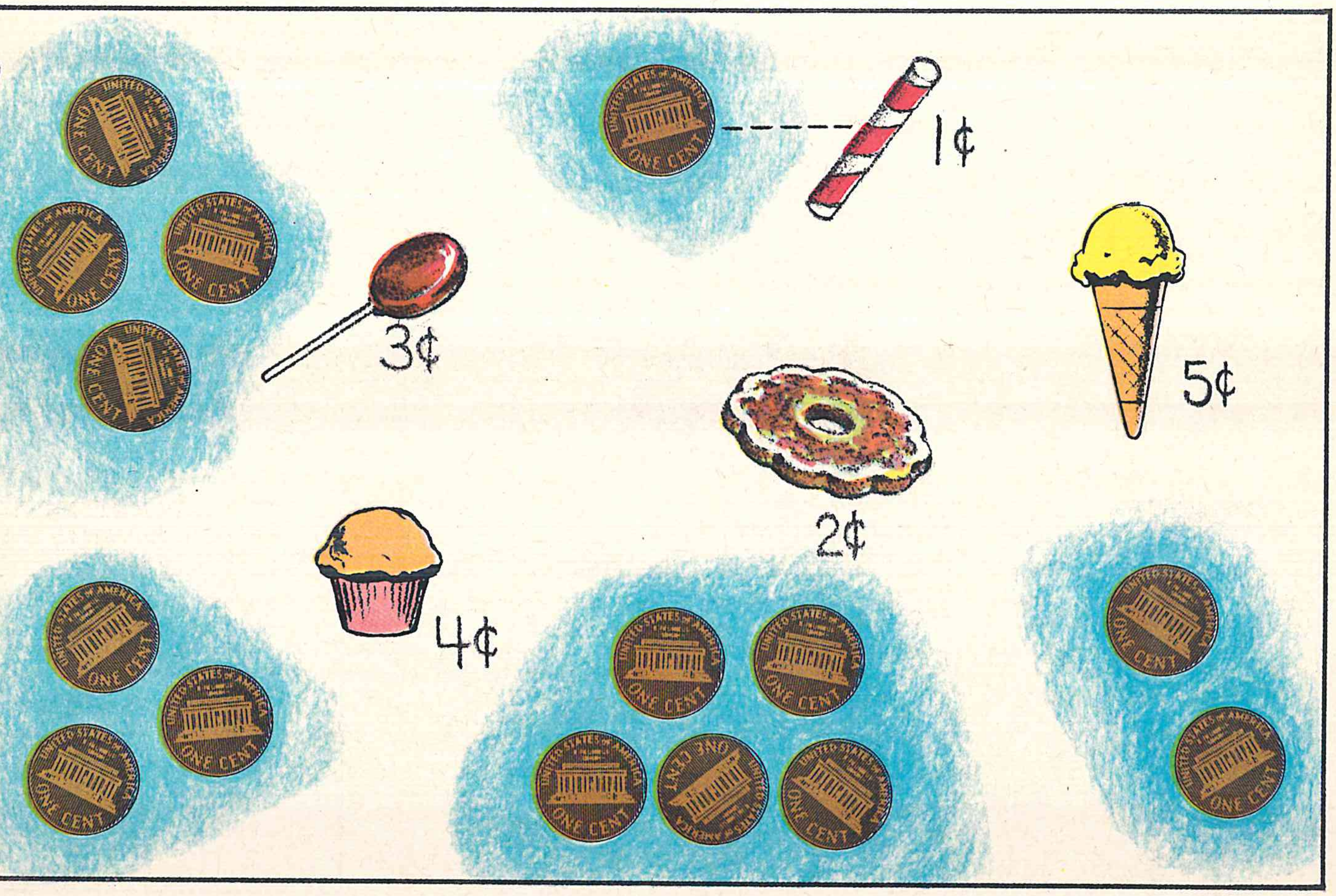

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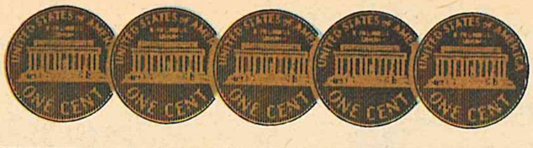

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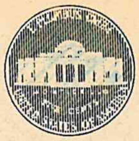

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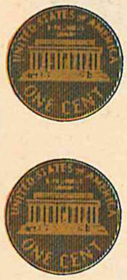

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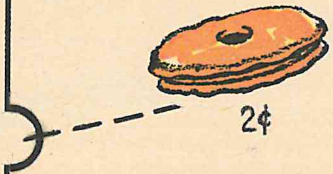

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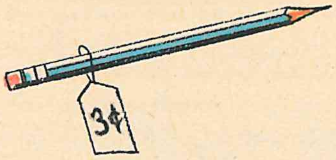

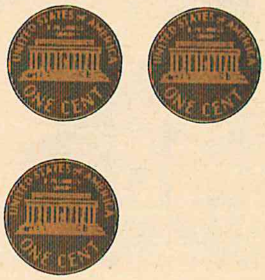

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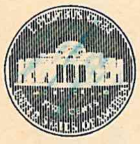

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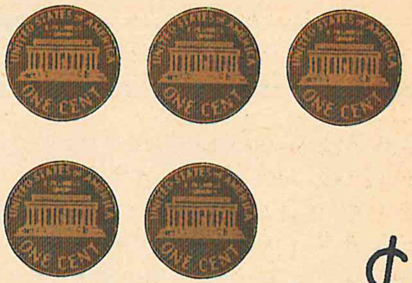

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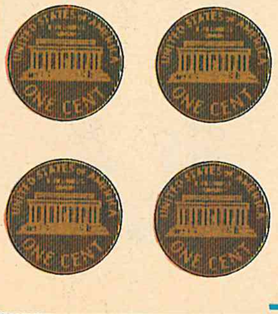

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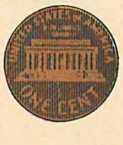

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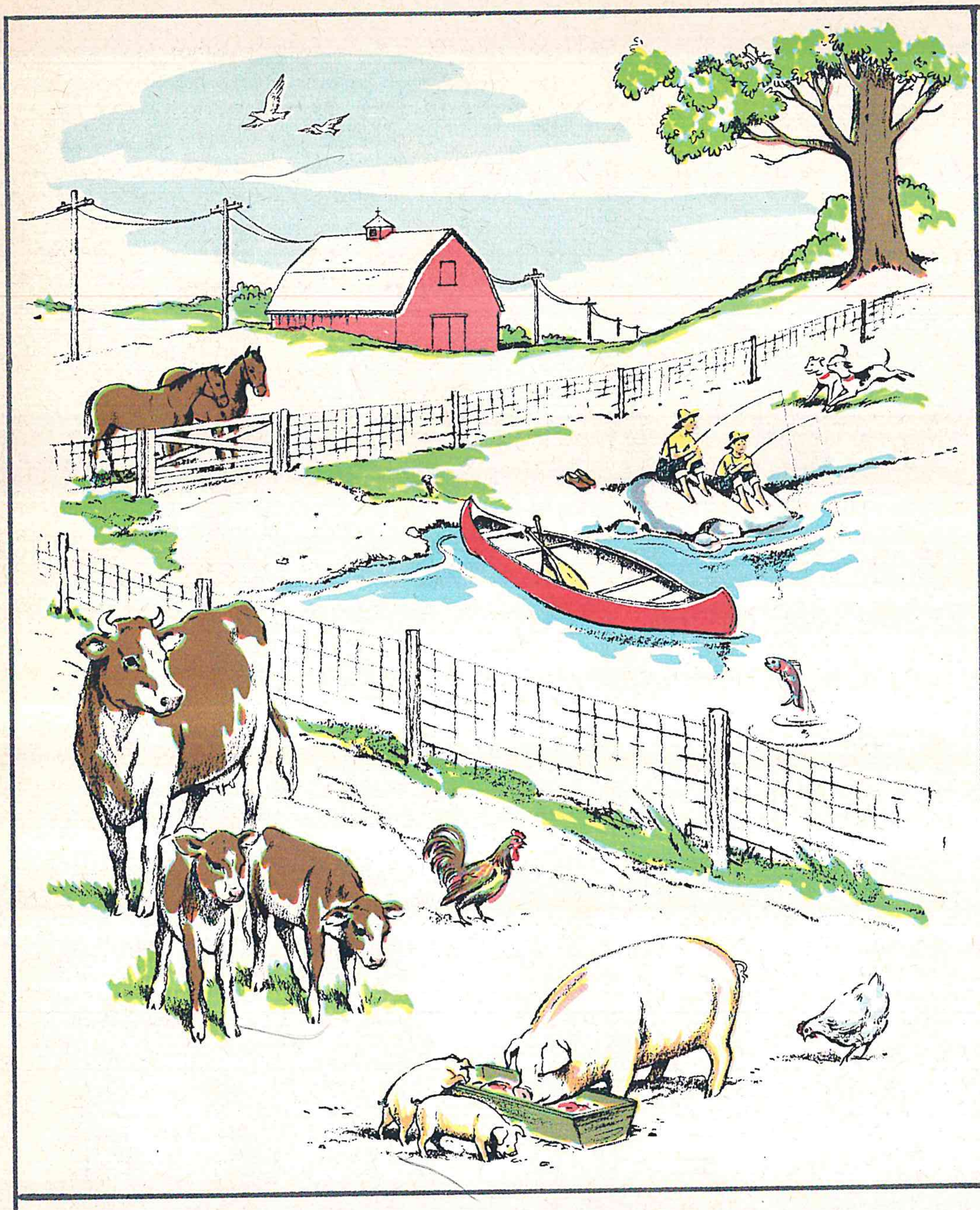

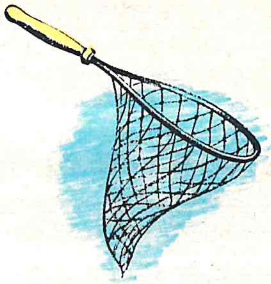

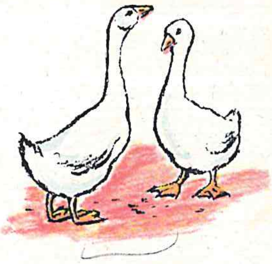

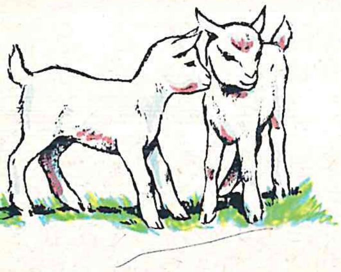

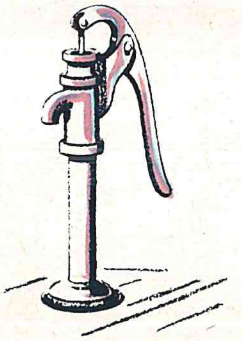

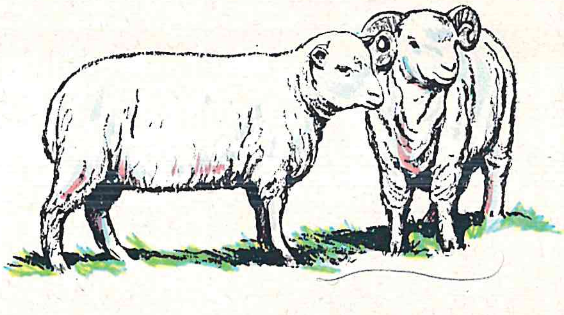

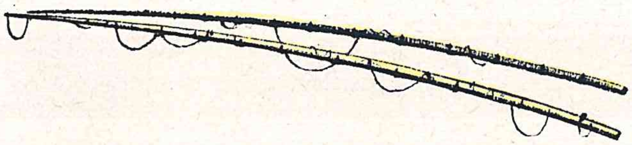

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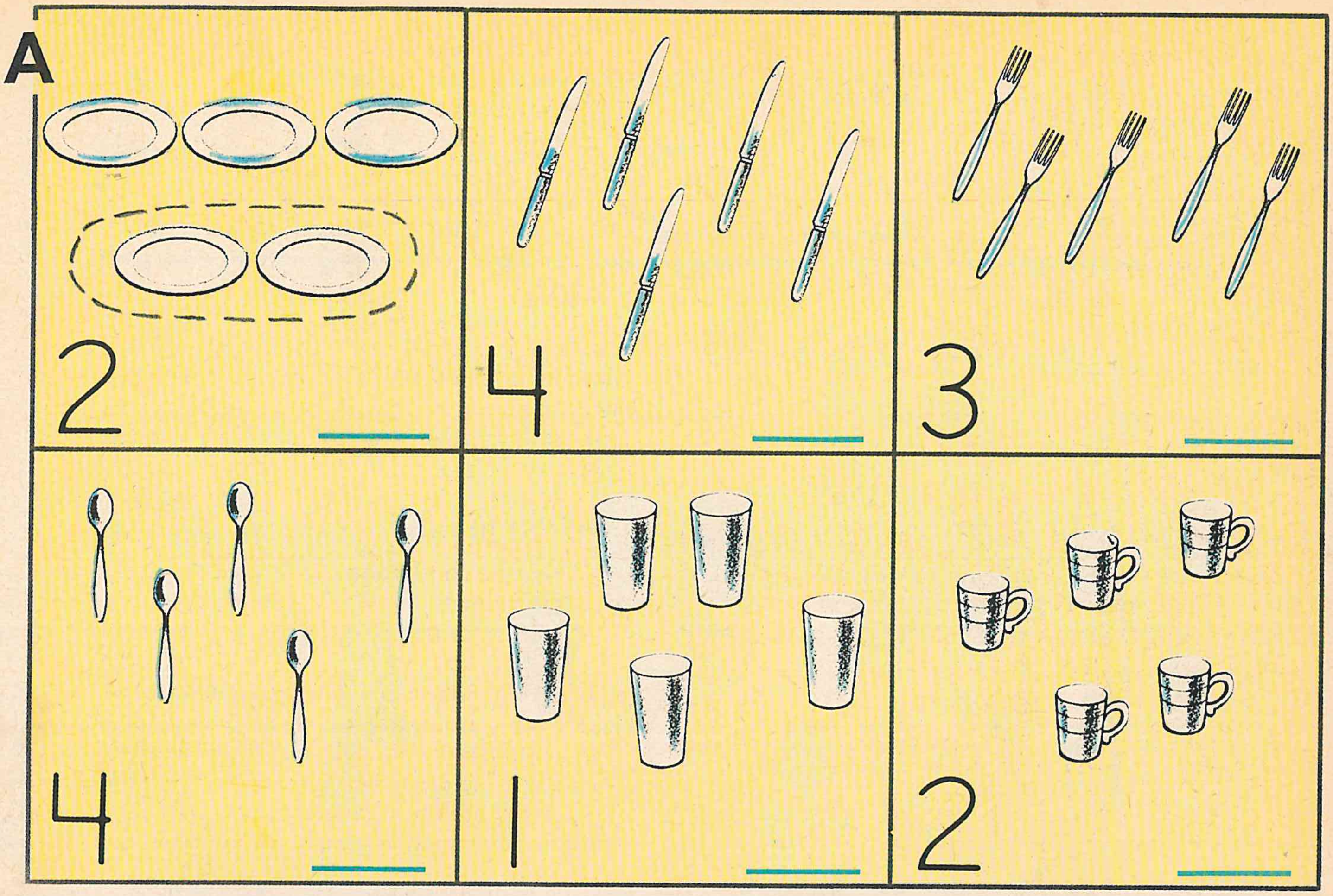

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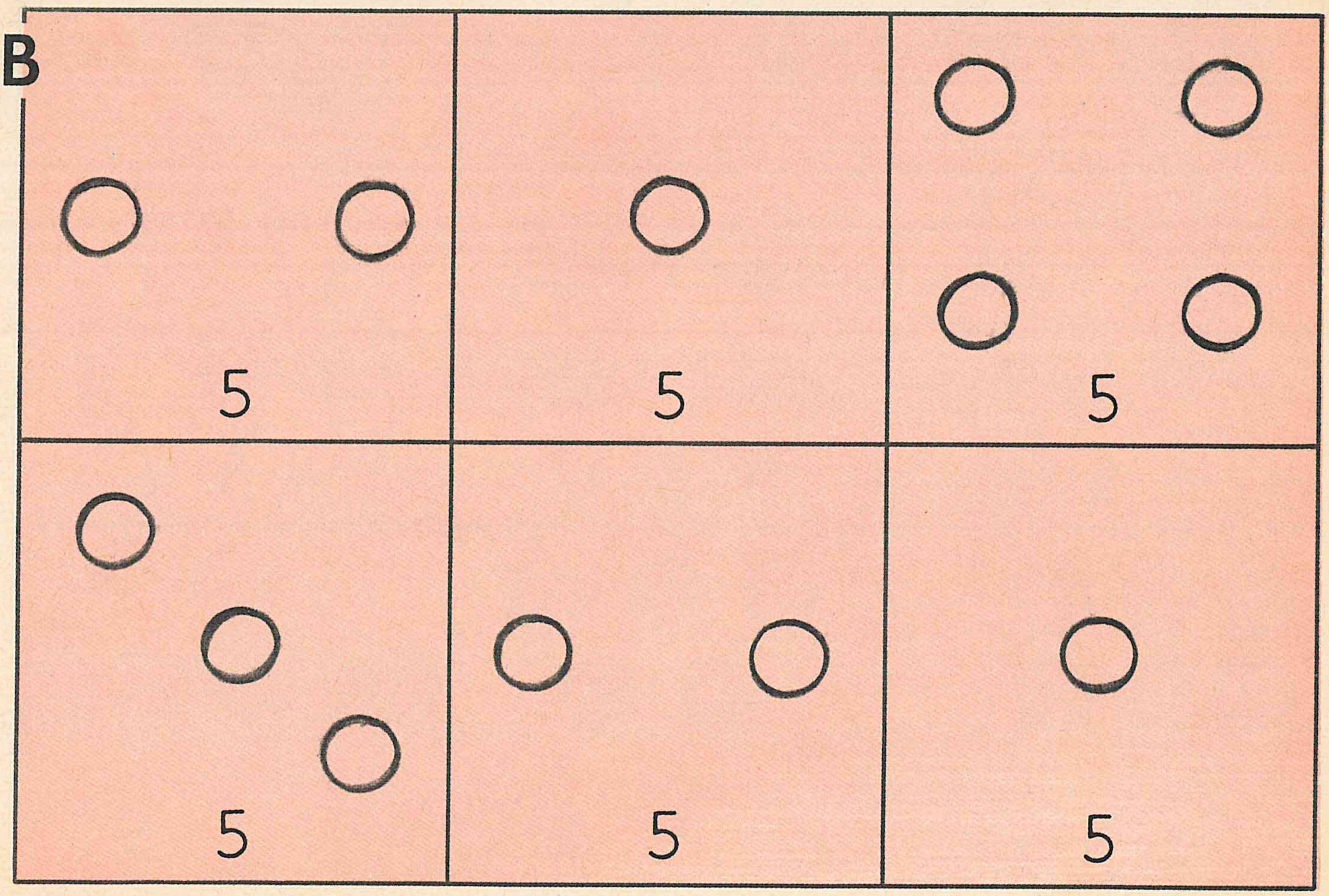

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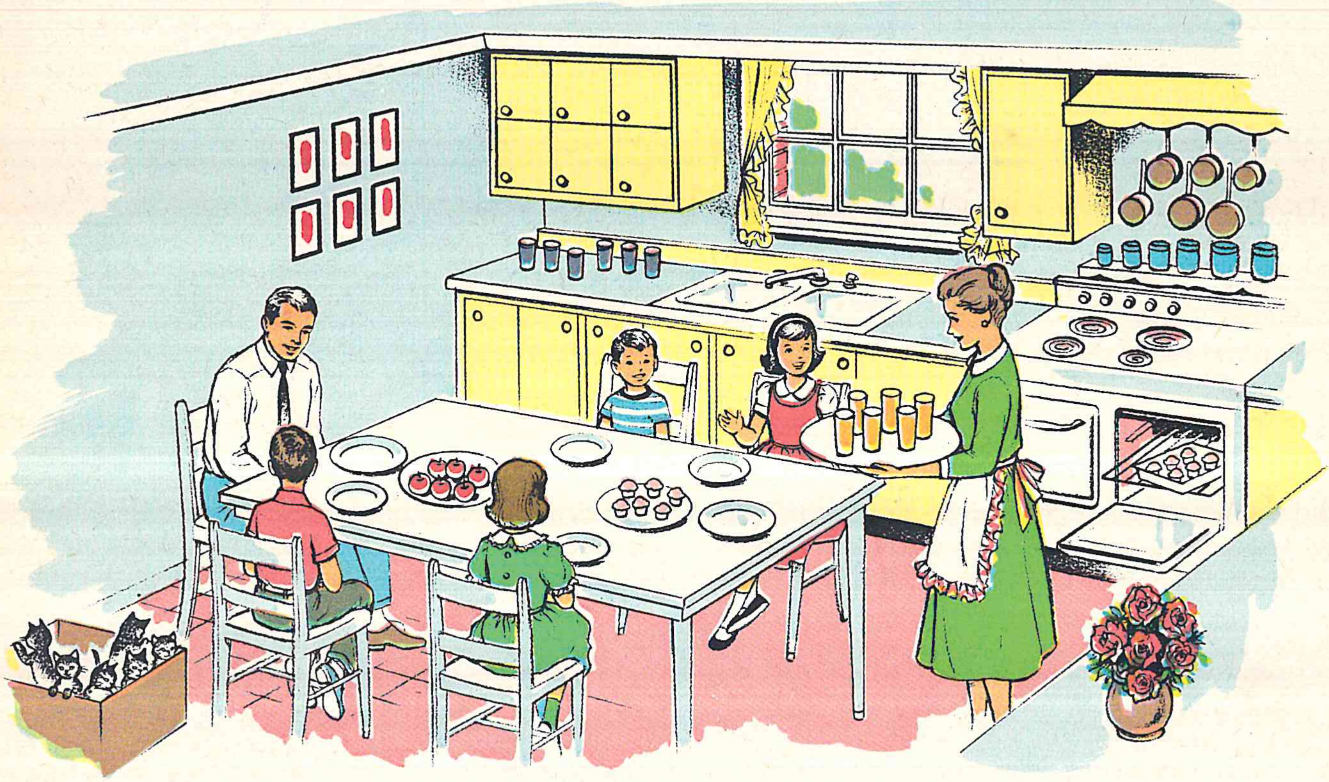

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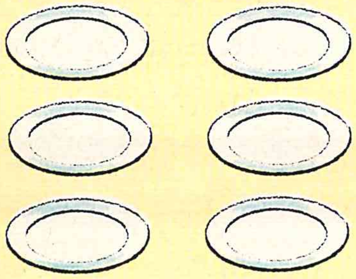

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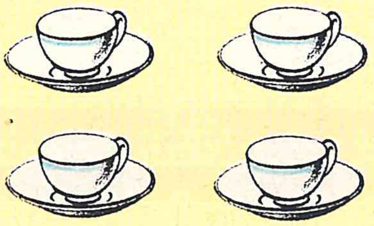

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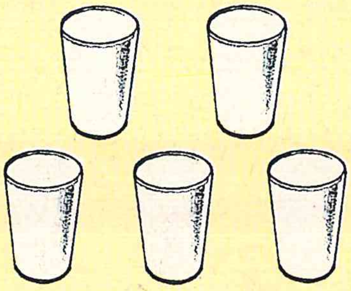

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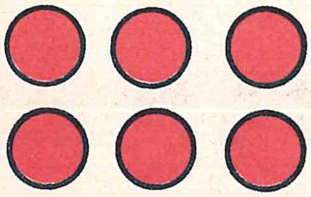

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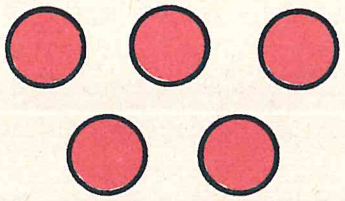

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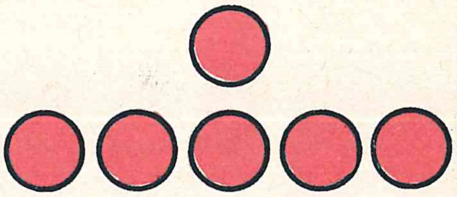

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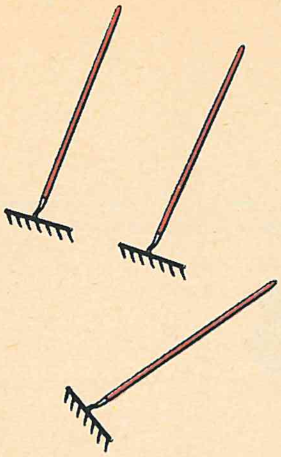
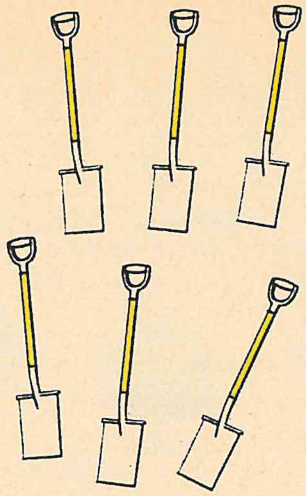
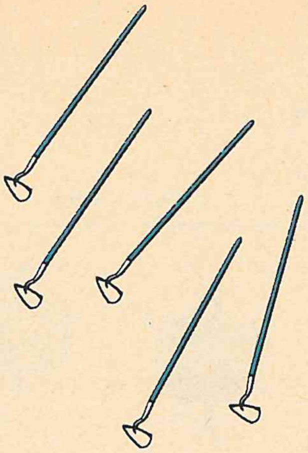
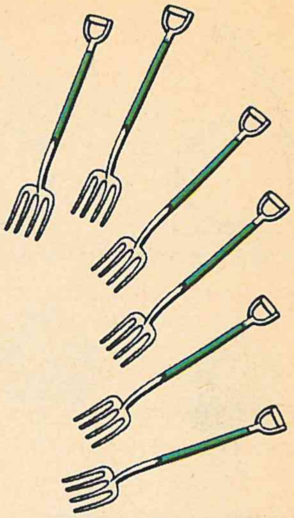
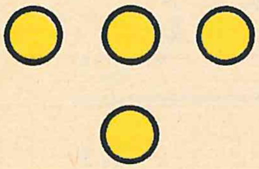
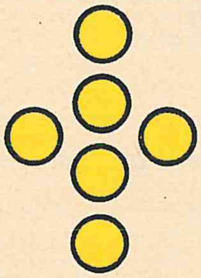
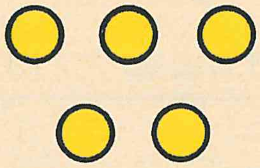
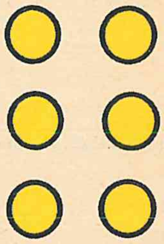
 3 4 5 6	 3 4 5 6	 3 4 5 6	 3 4 5 6
 3 4 5 6	 3 4 5 6	 3 4 5 6	 3 4 5 6

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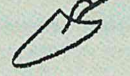
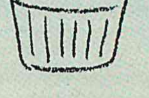
 4	 6	 5	 3

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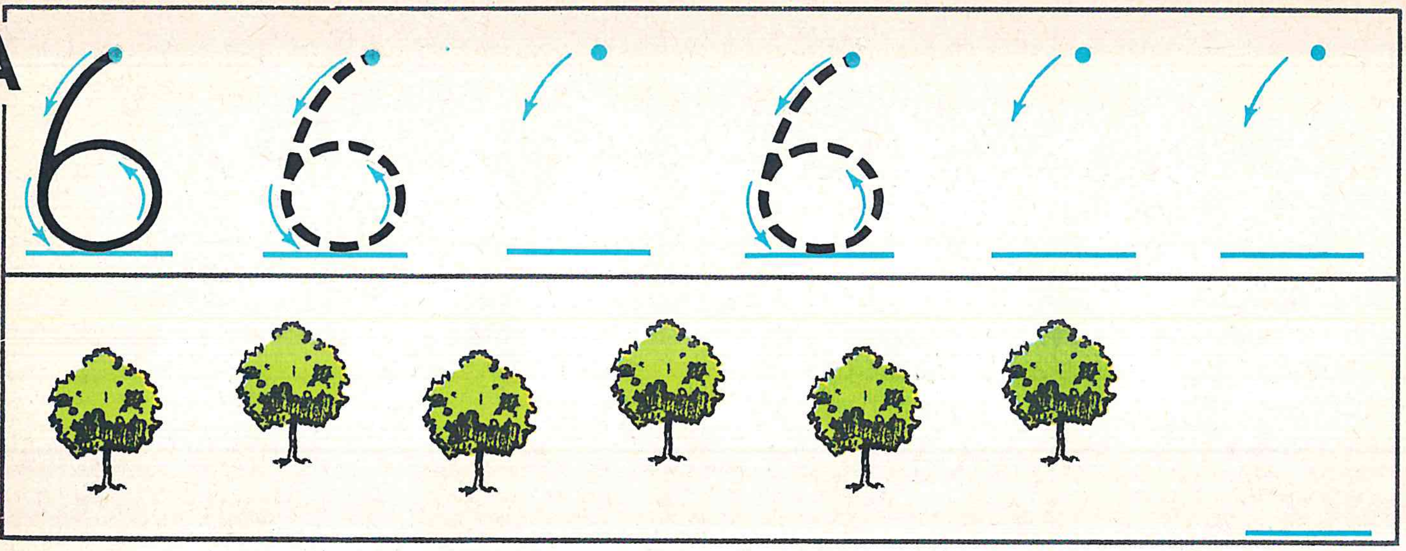

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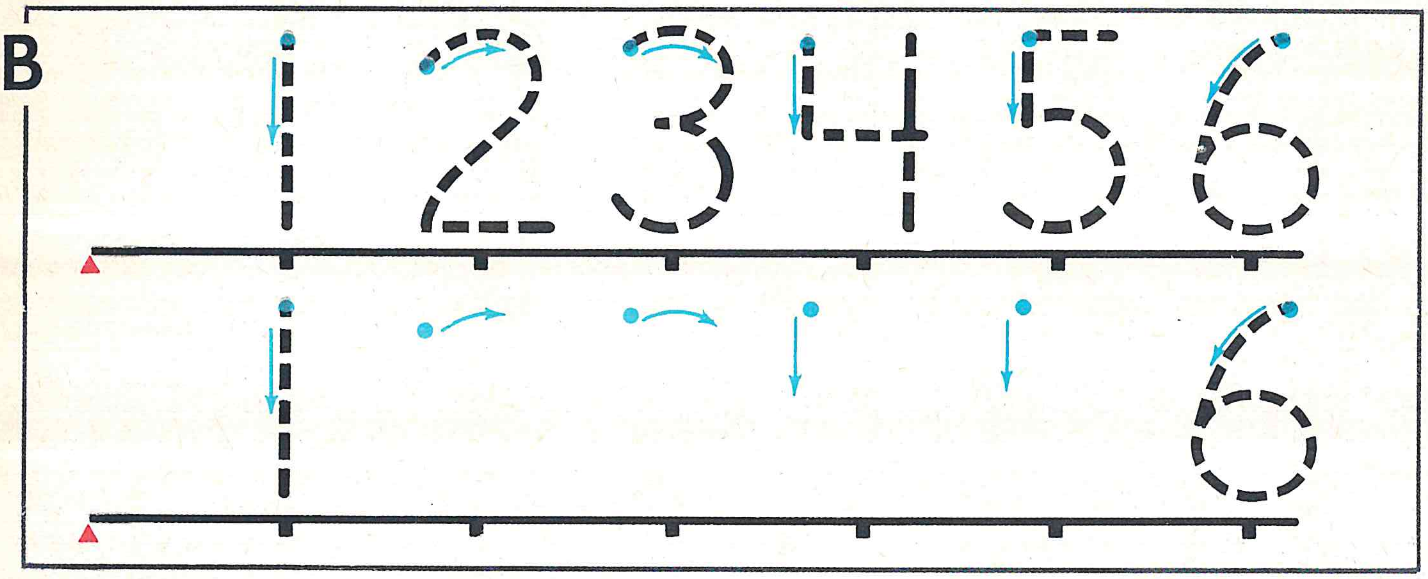

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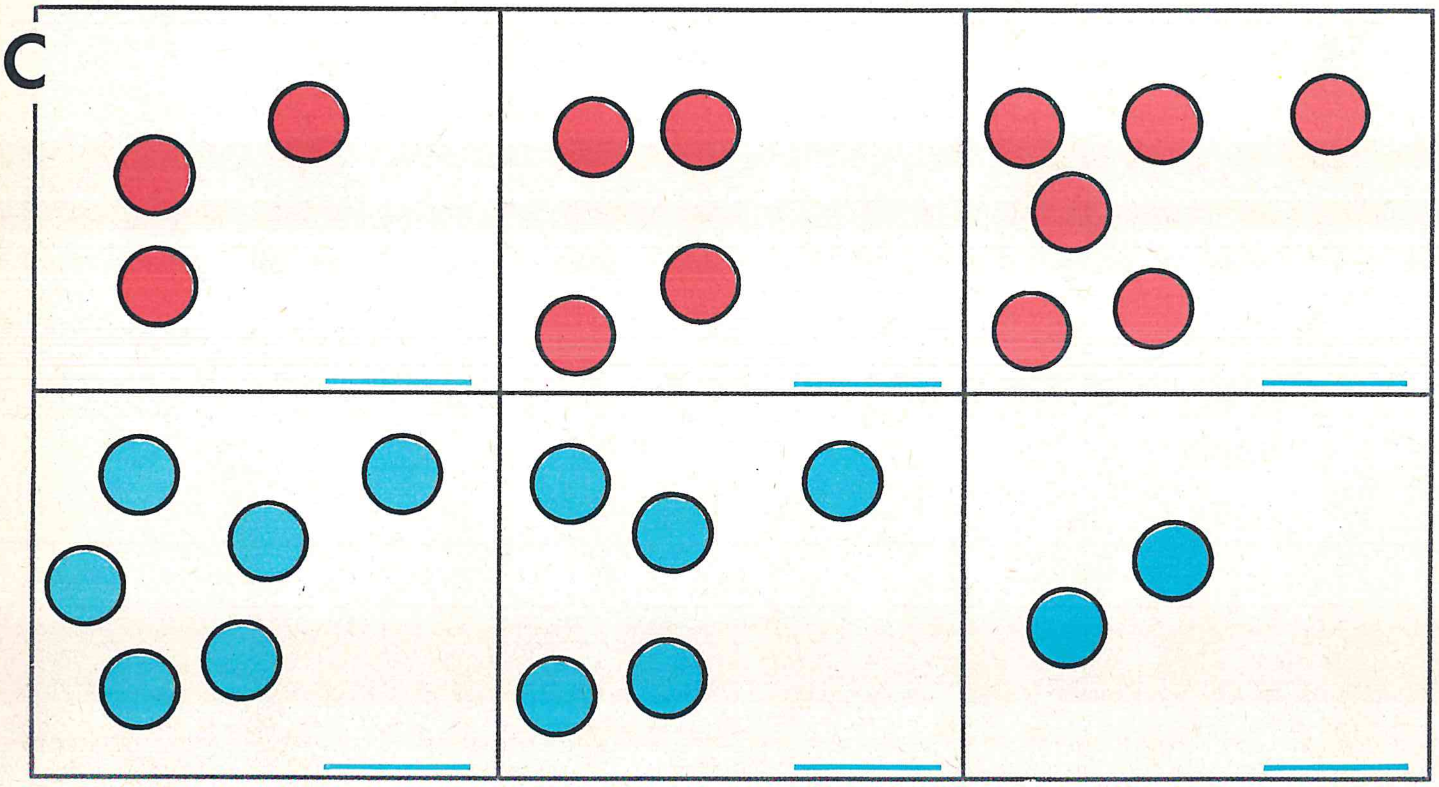

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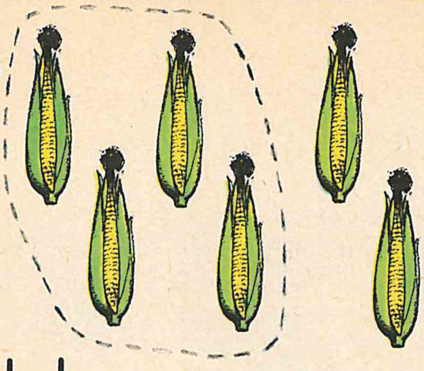

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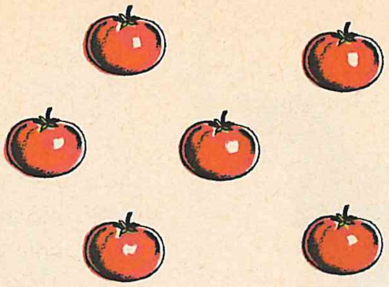

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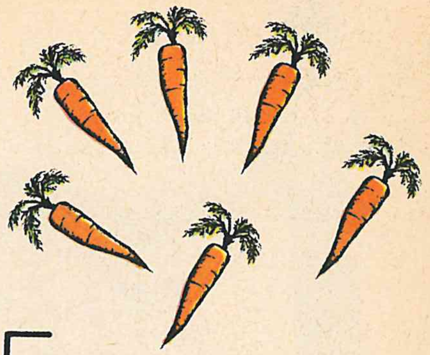

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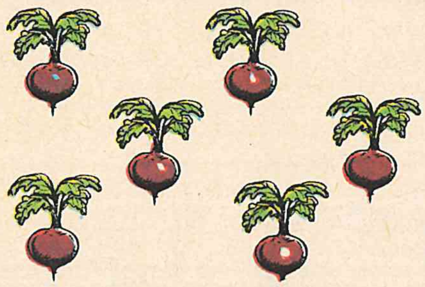

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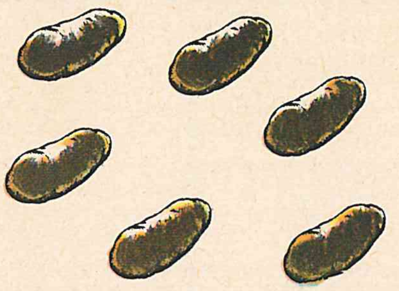

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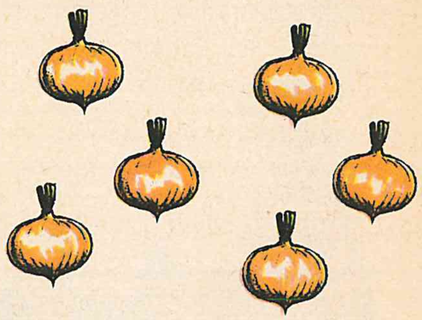

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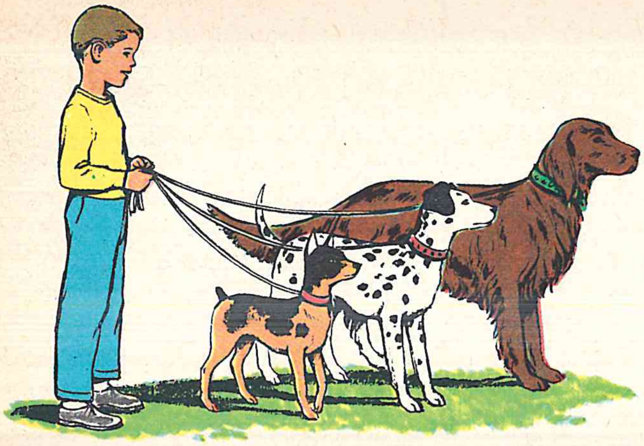

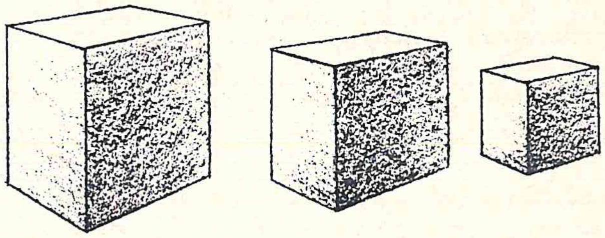

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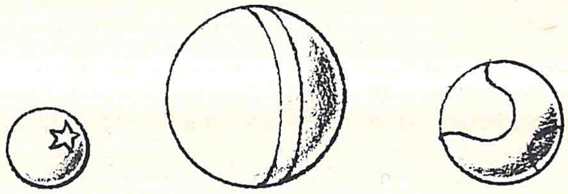

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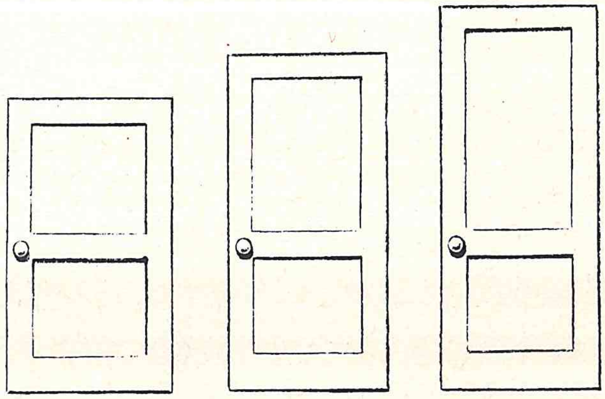

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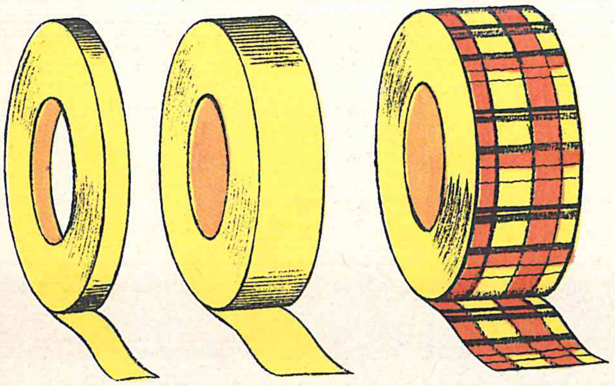

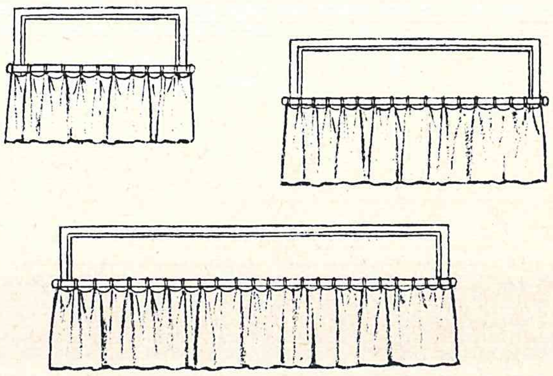

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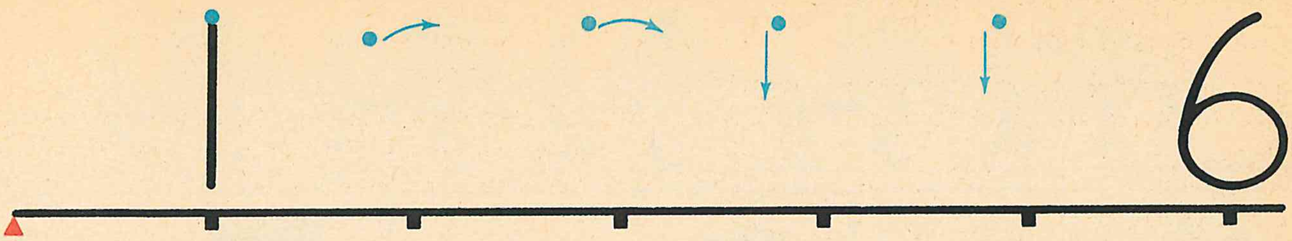

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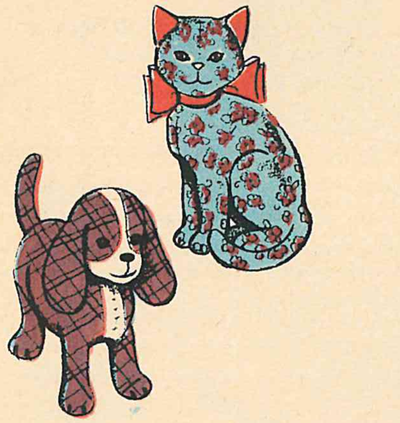

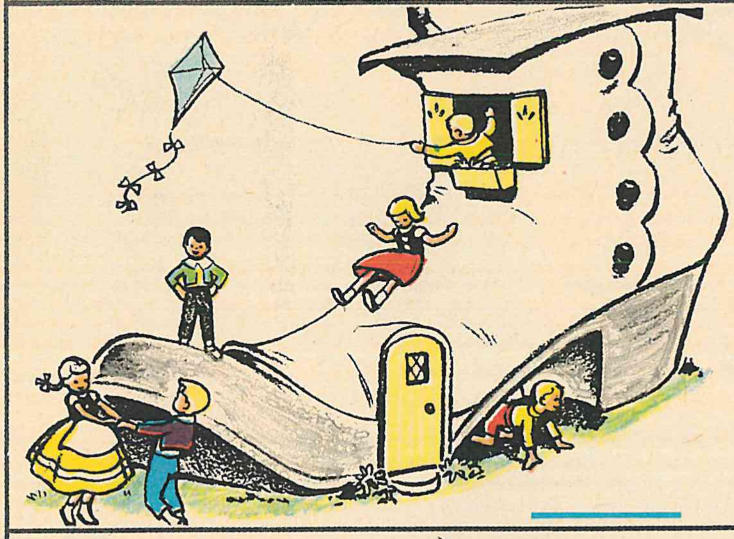

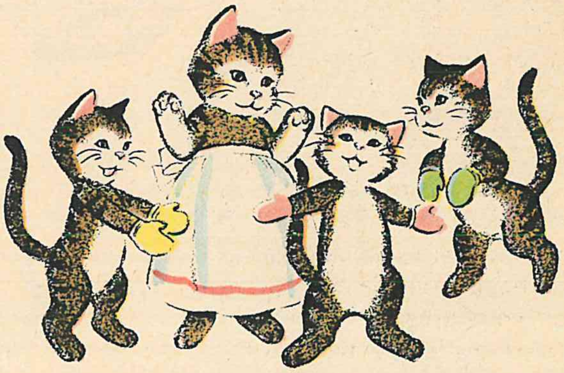

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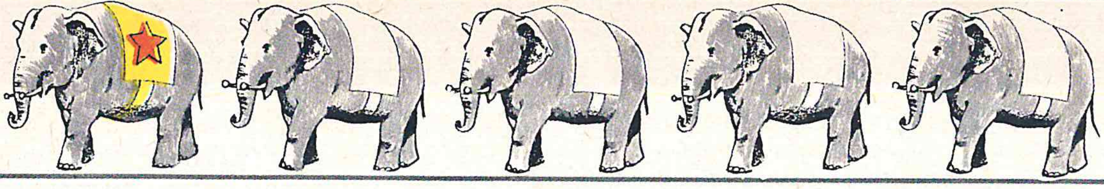

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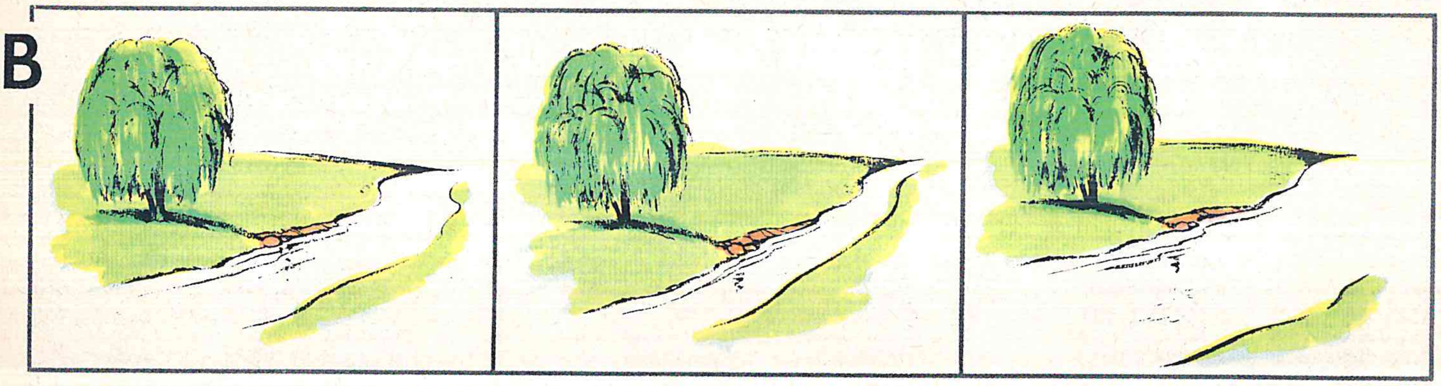

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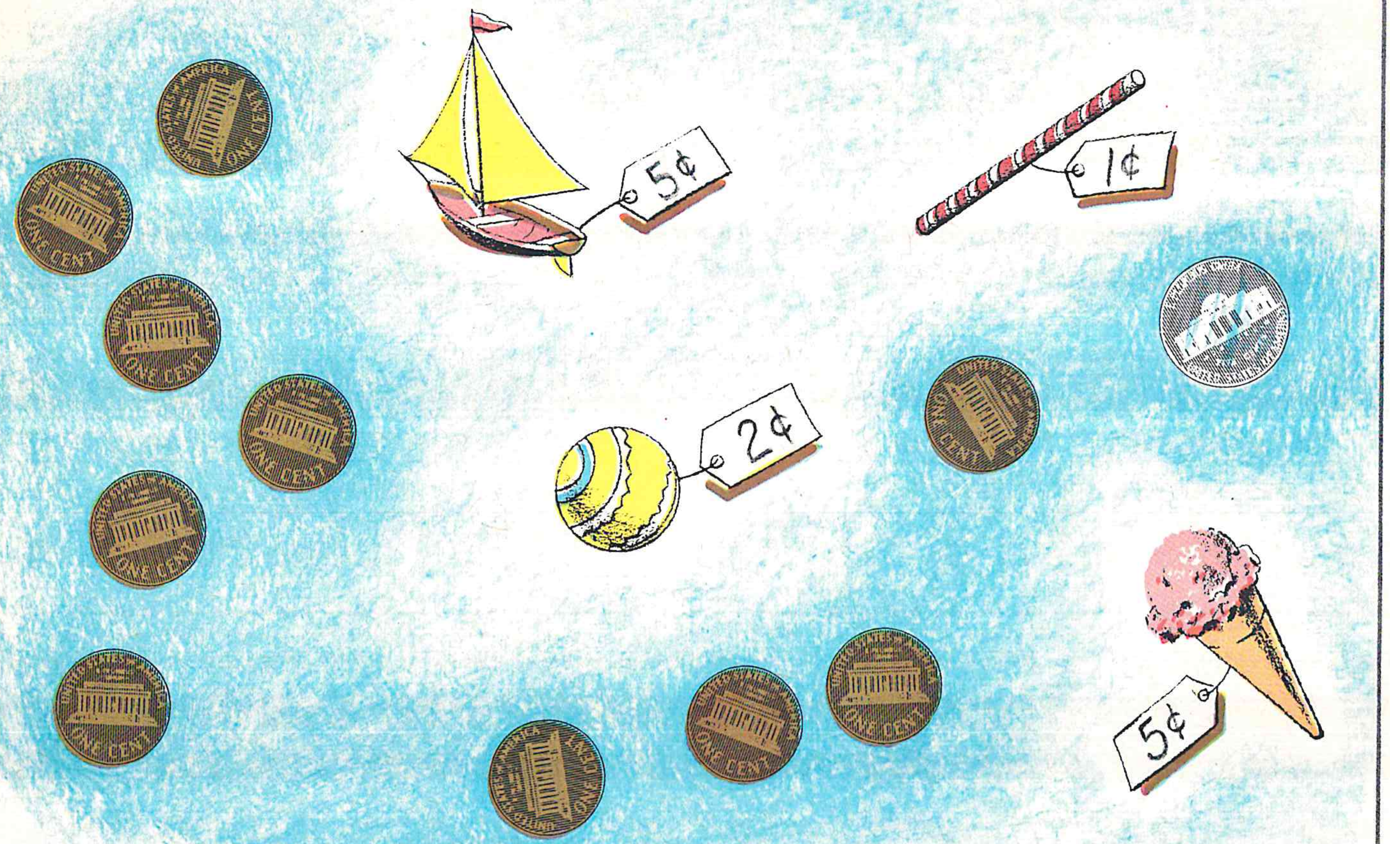

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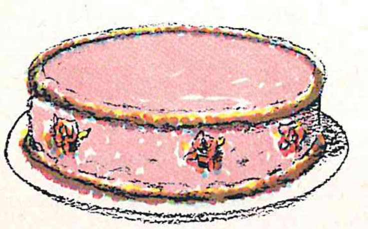

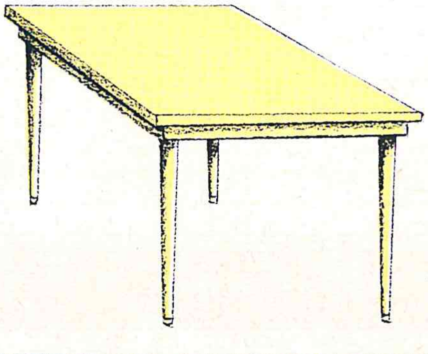

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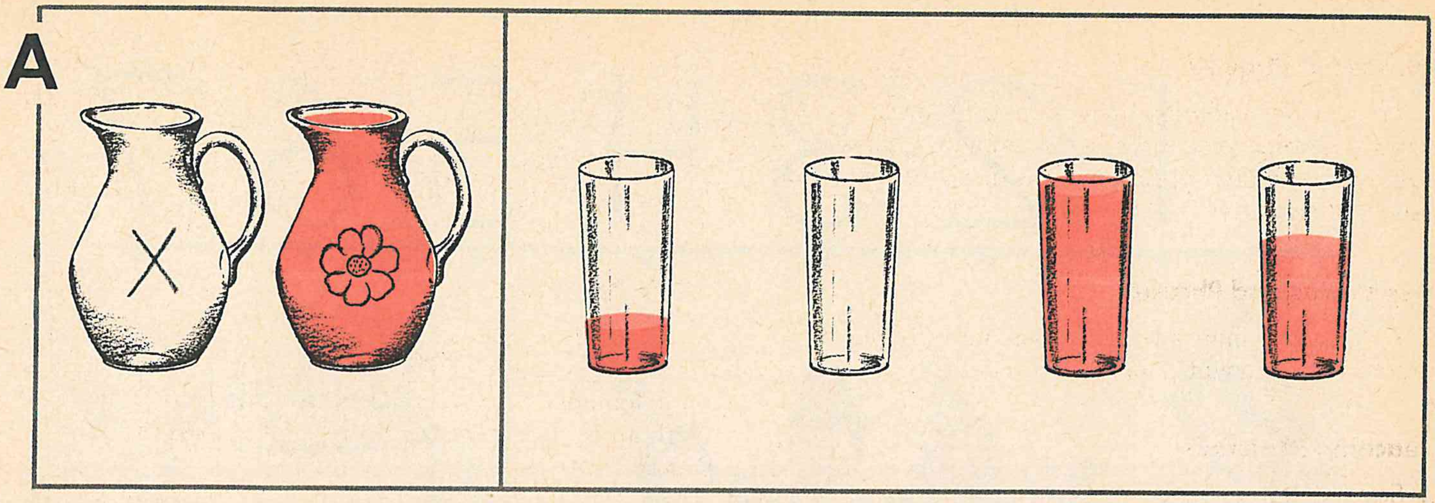

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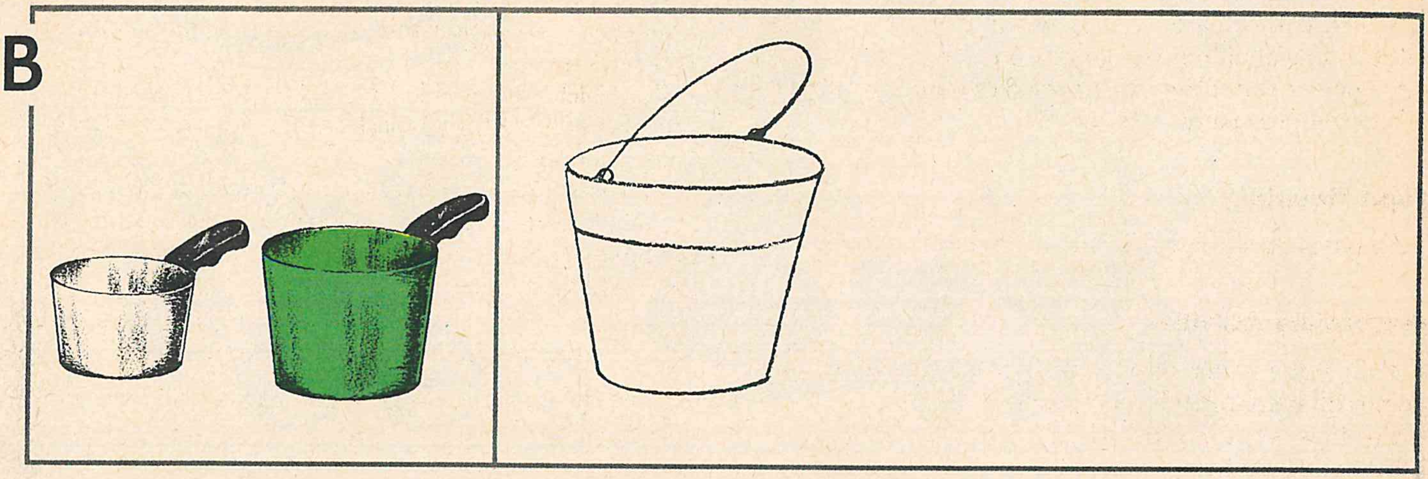

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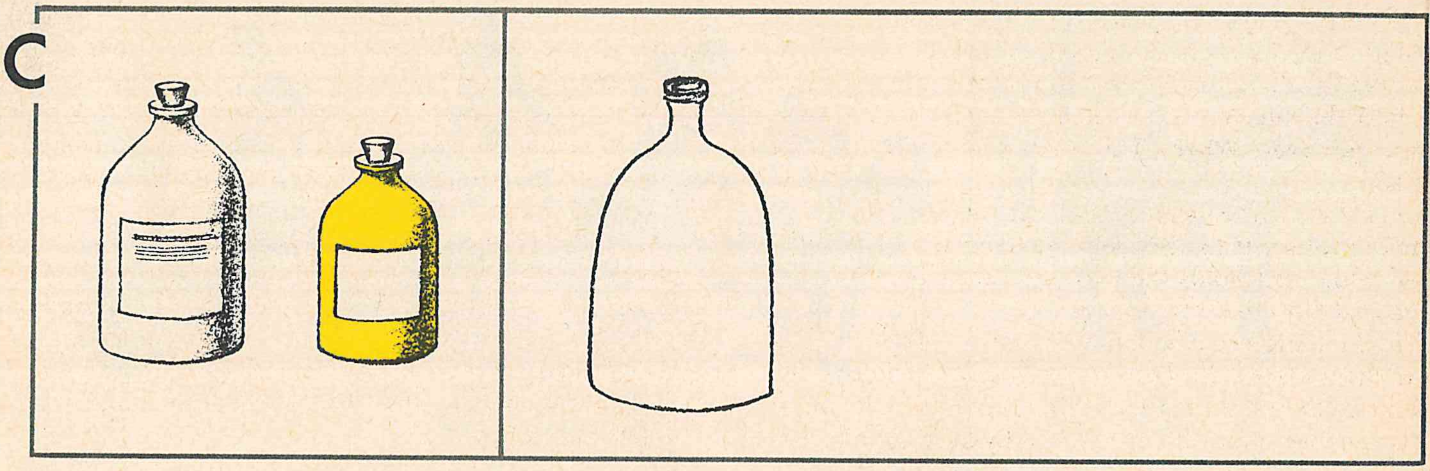

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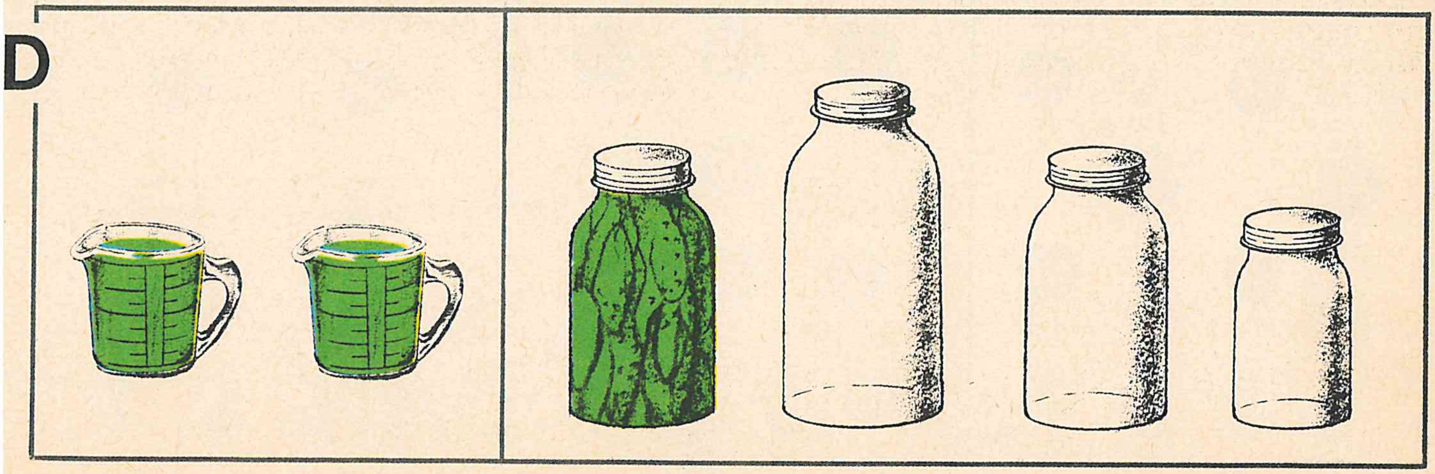

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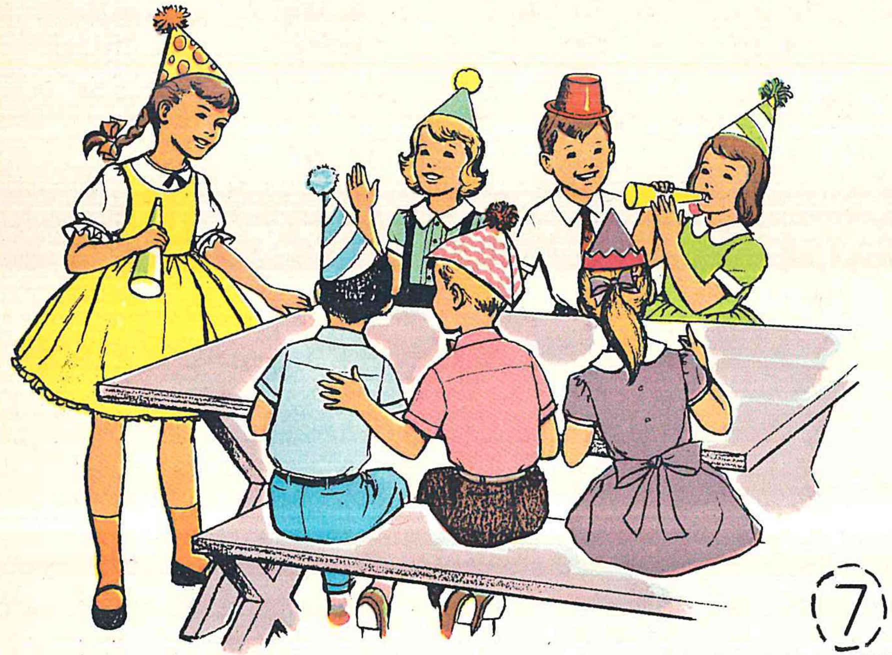

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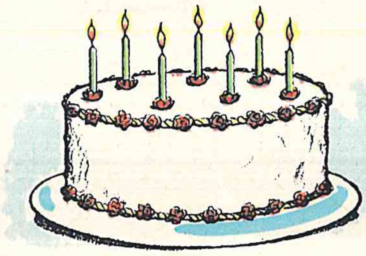

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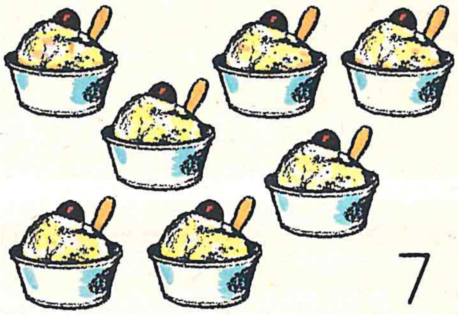

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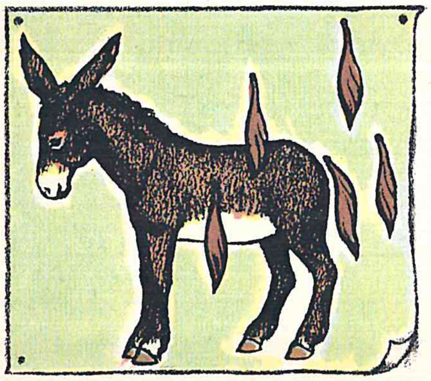

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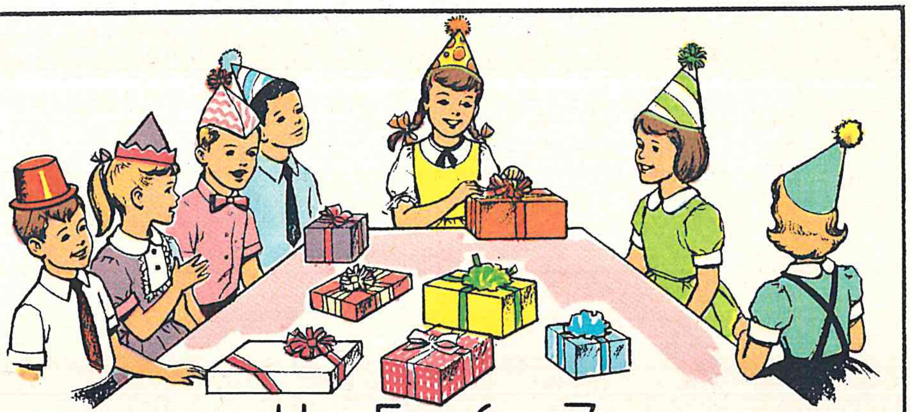

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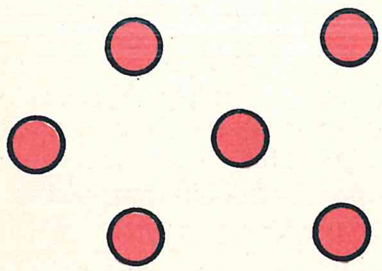

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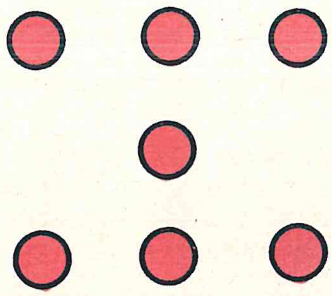

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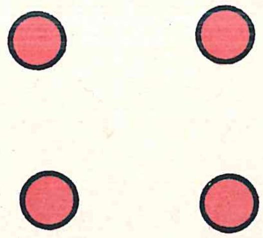

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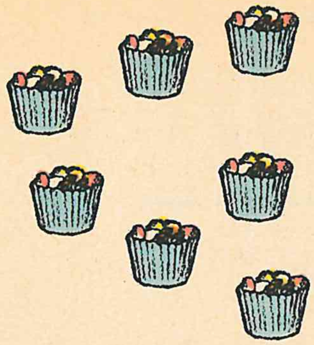

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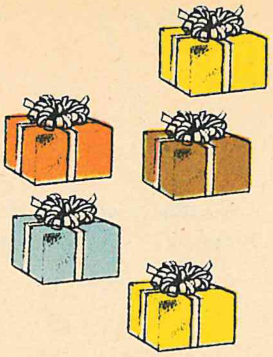

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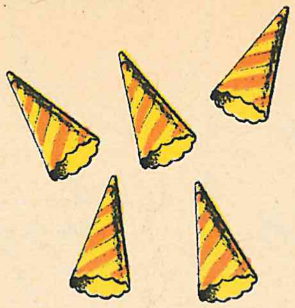

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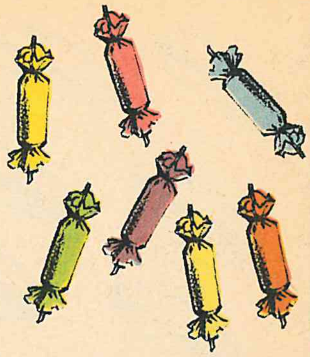

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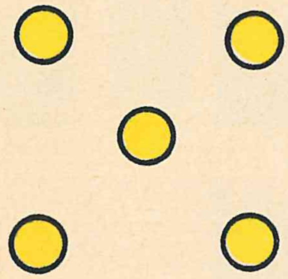

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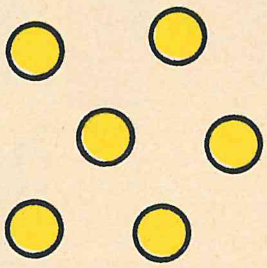

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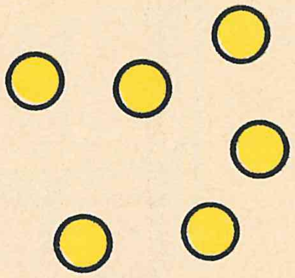

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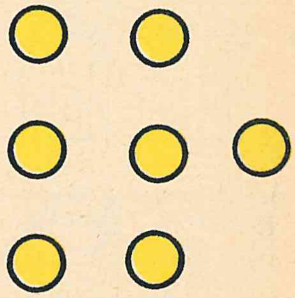

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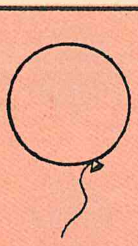

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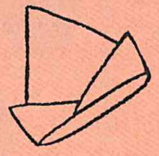

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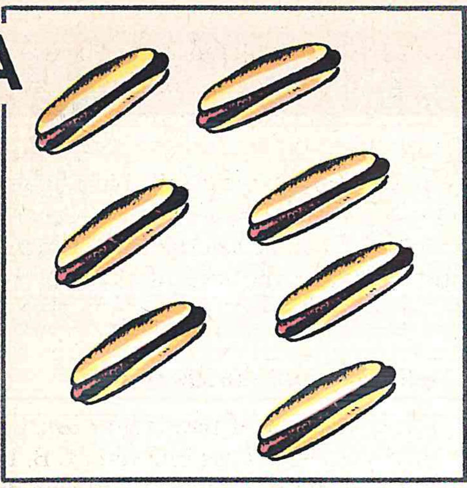

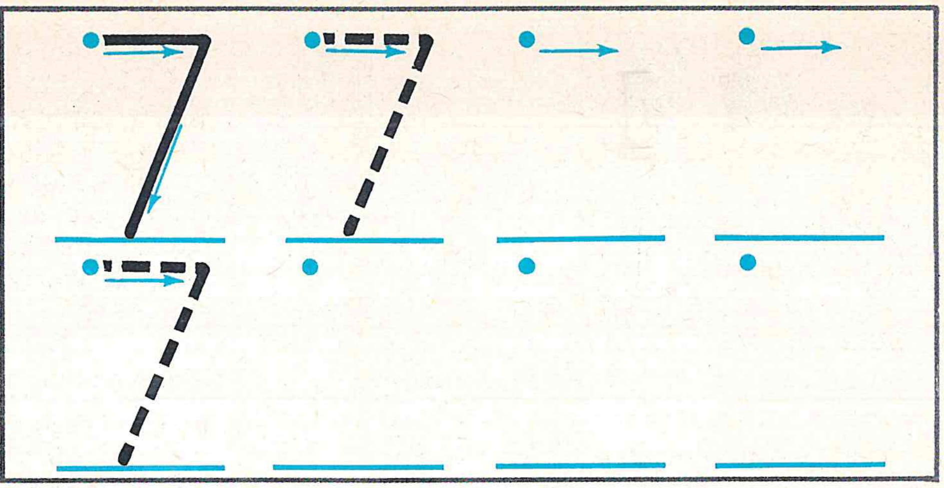

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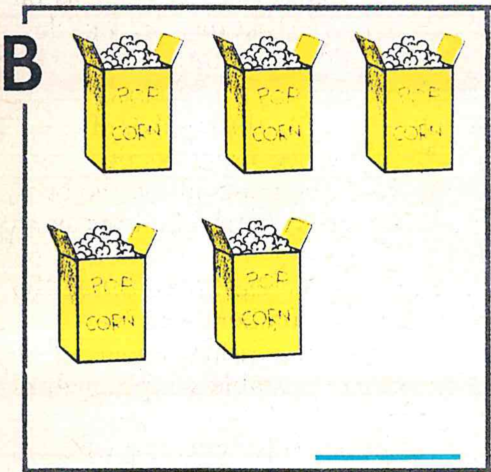

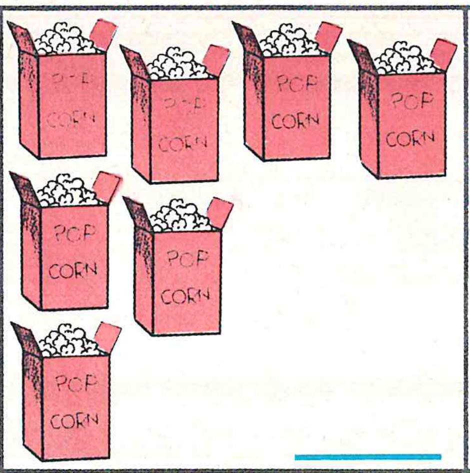

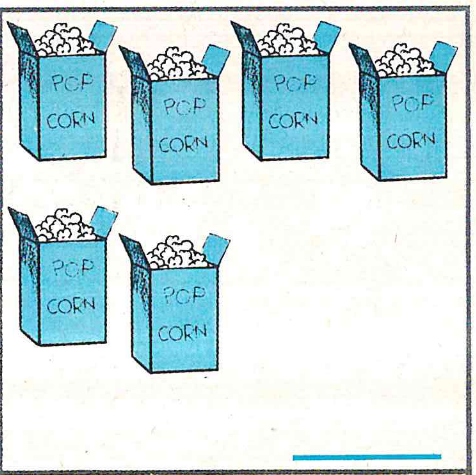

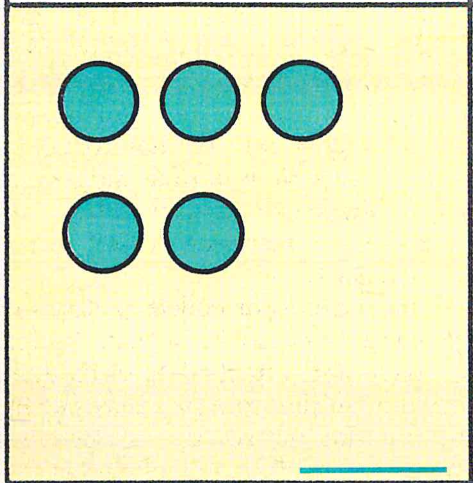

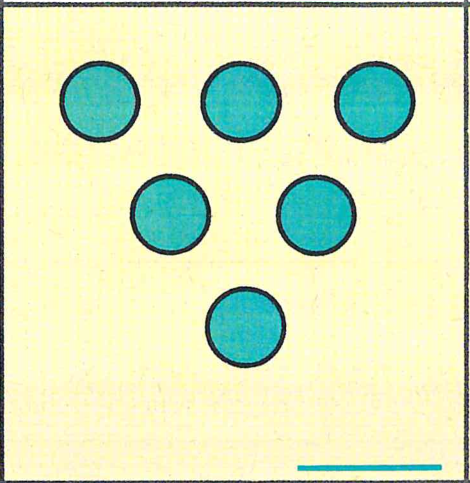

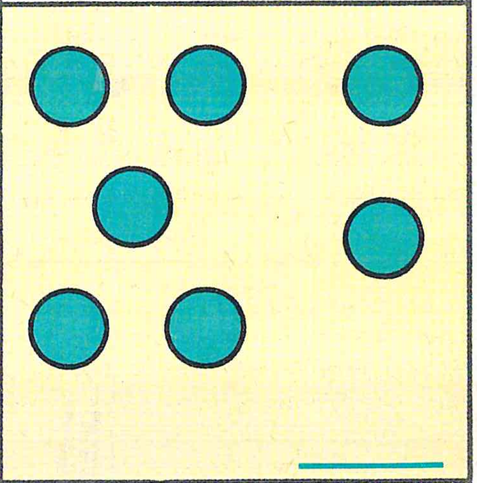

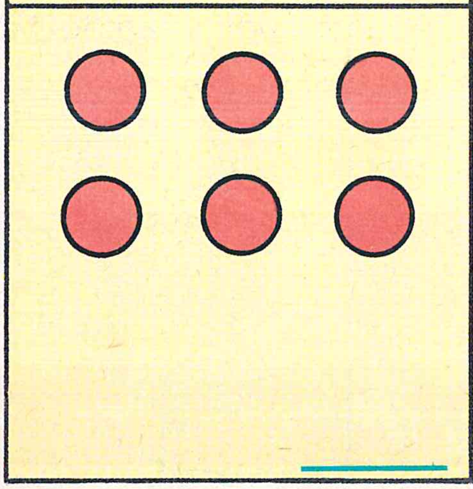

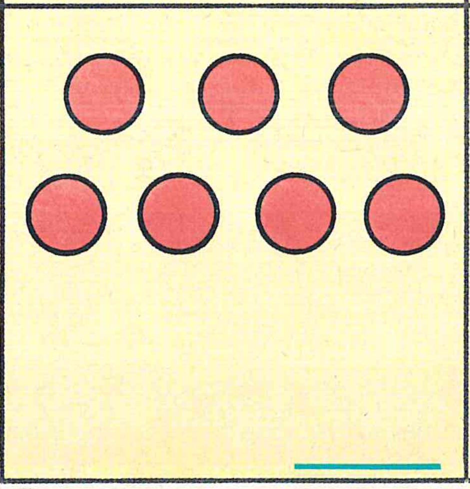

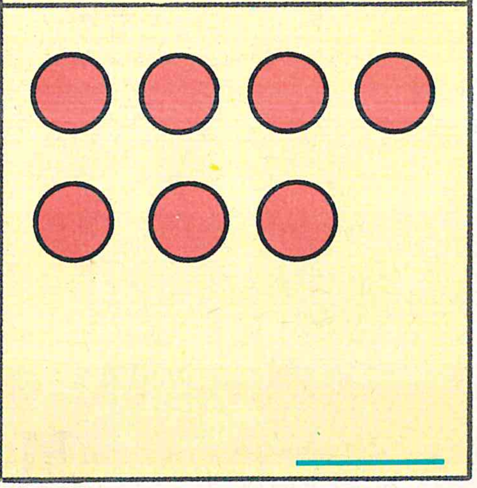

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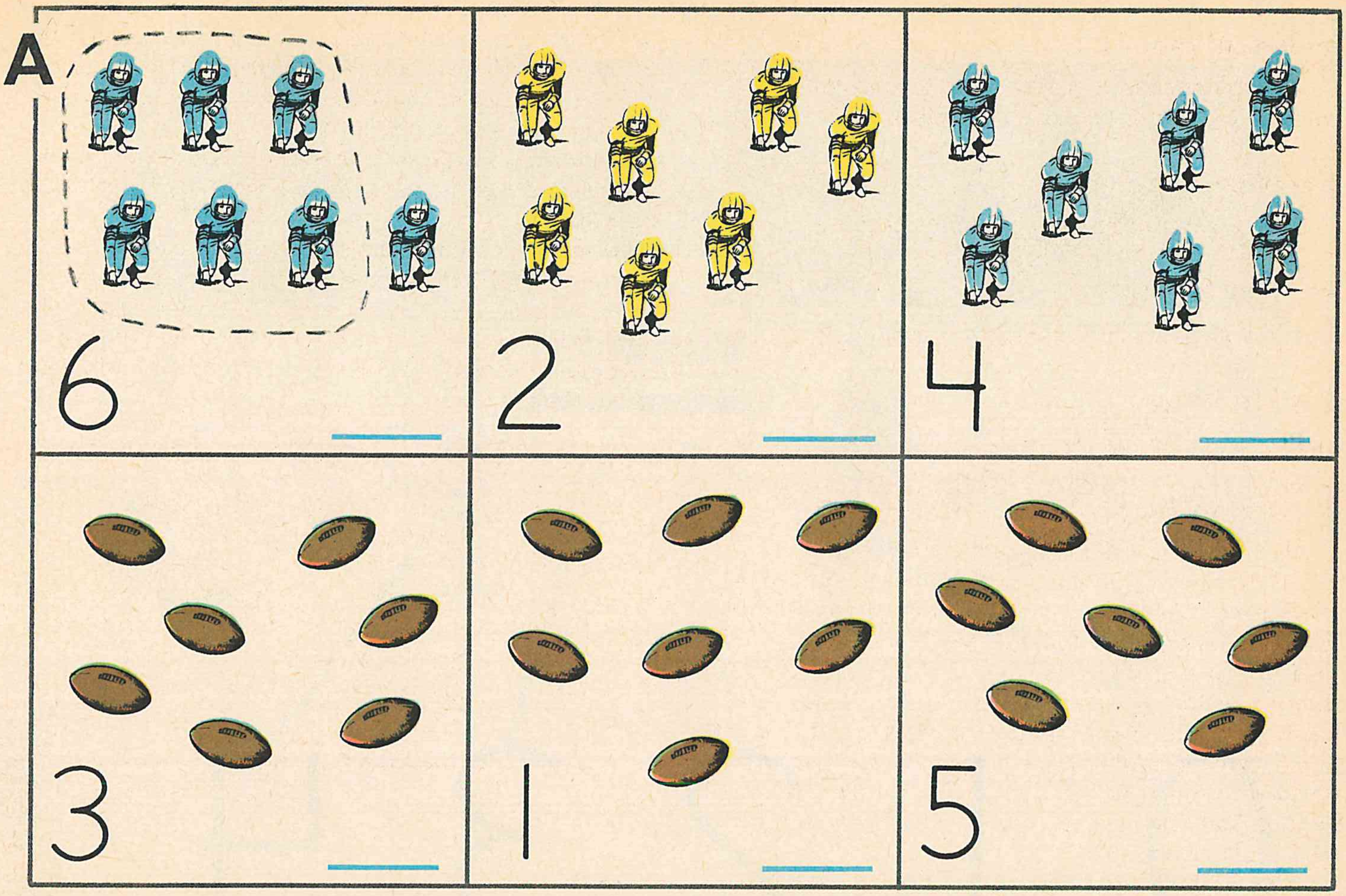

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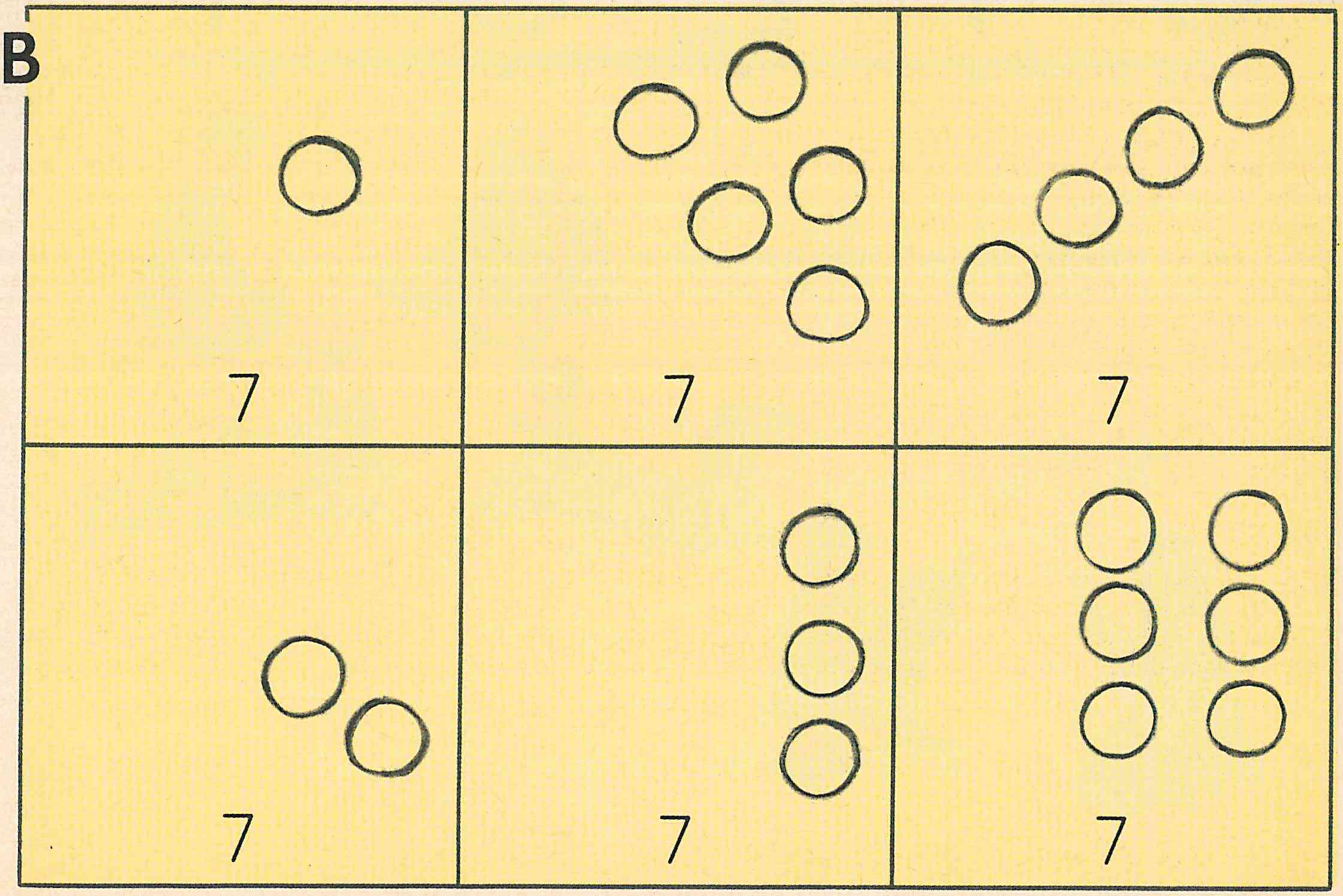

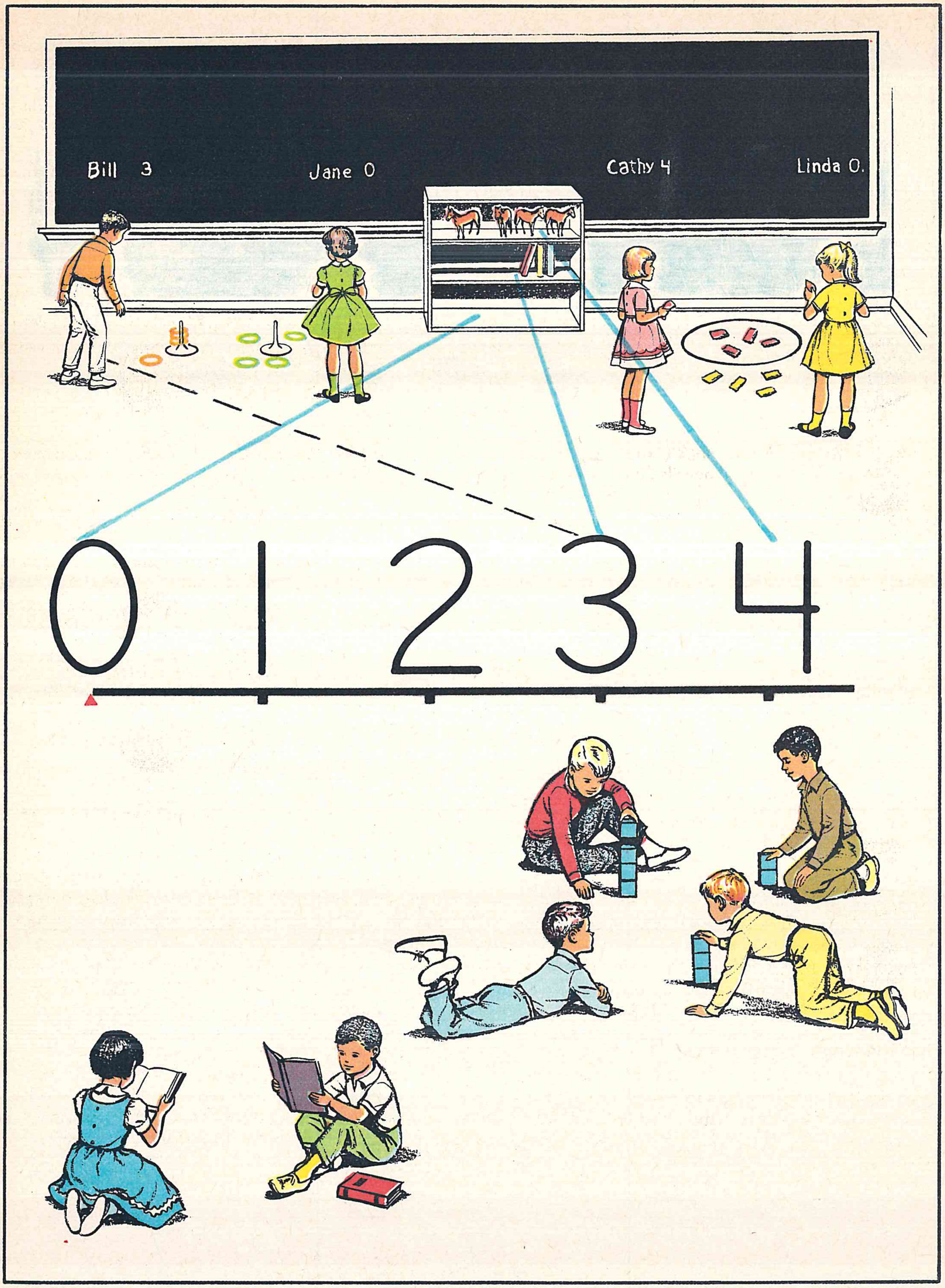
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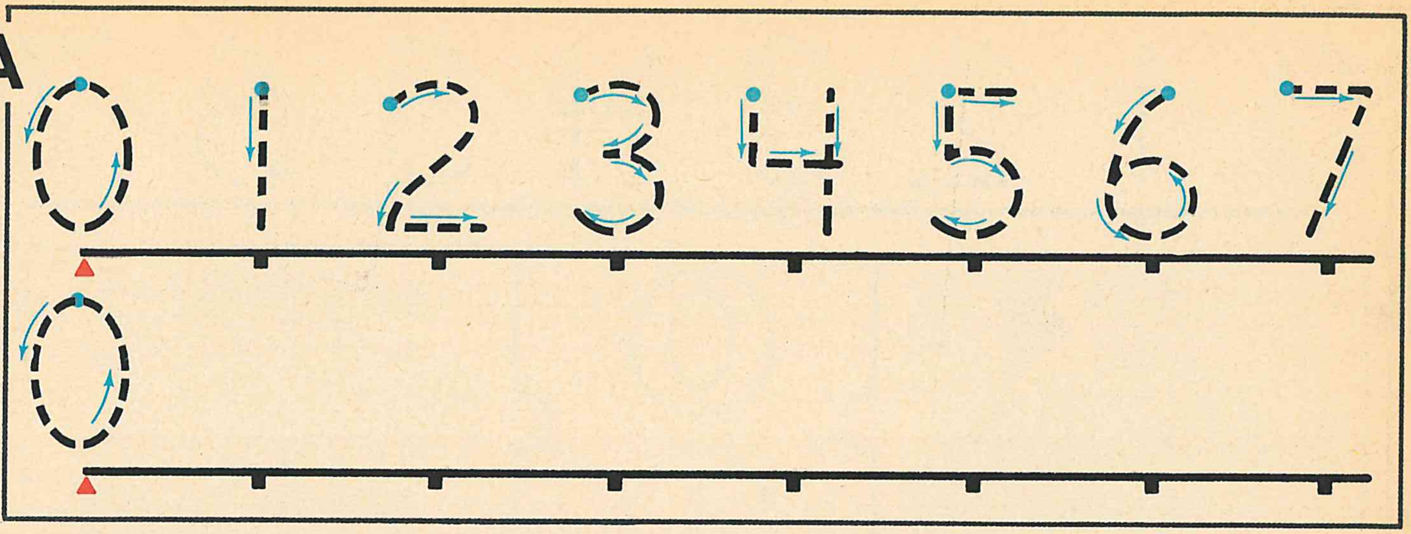

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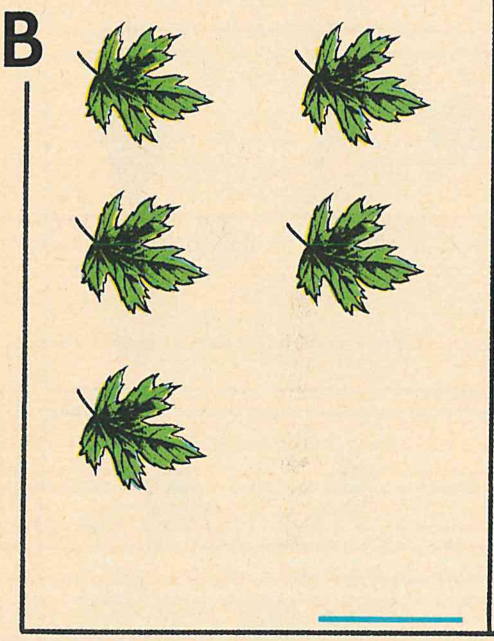

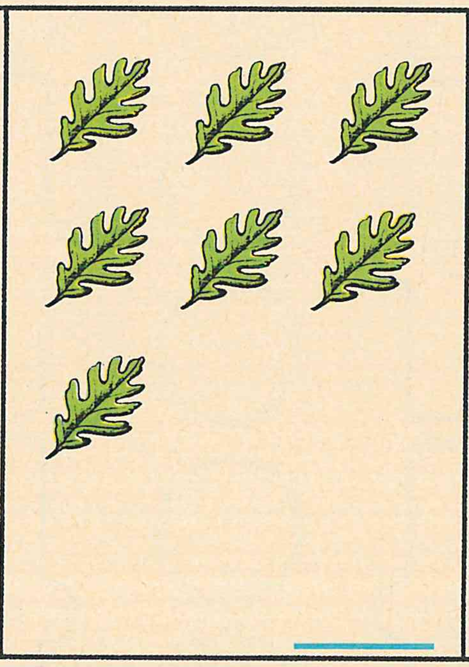

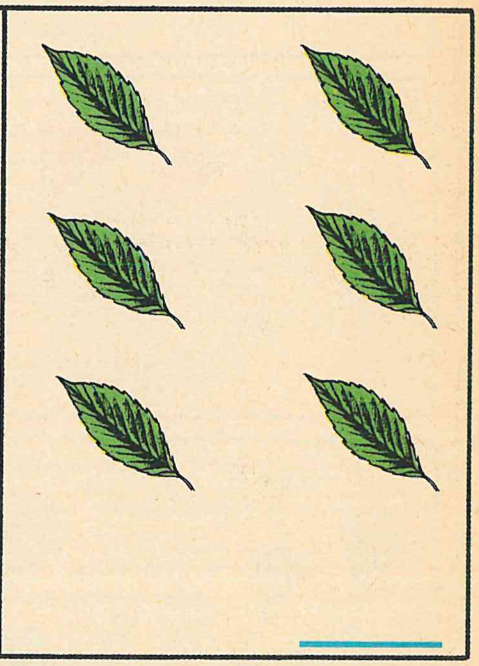

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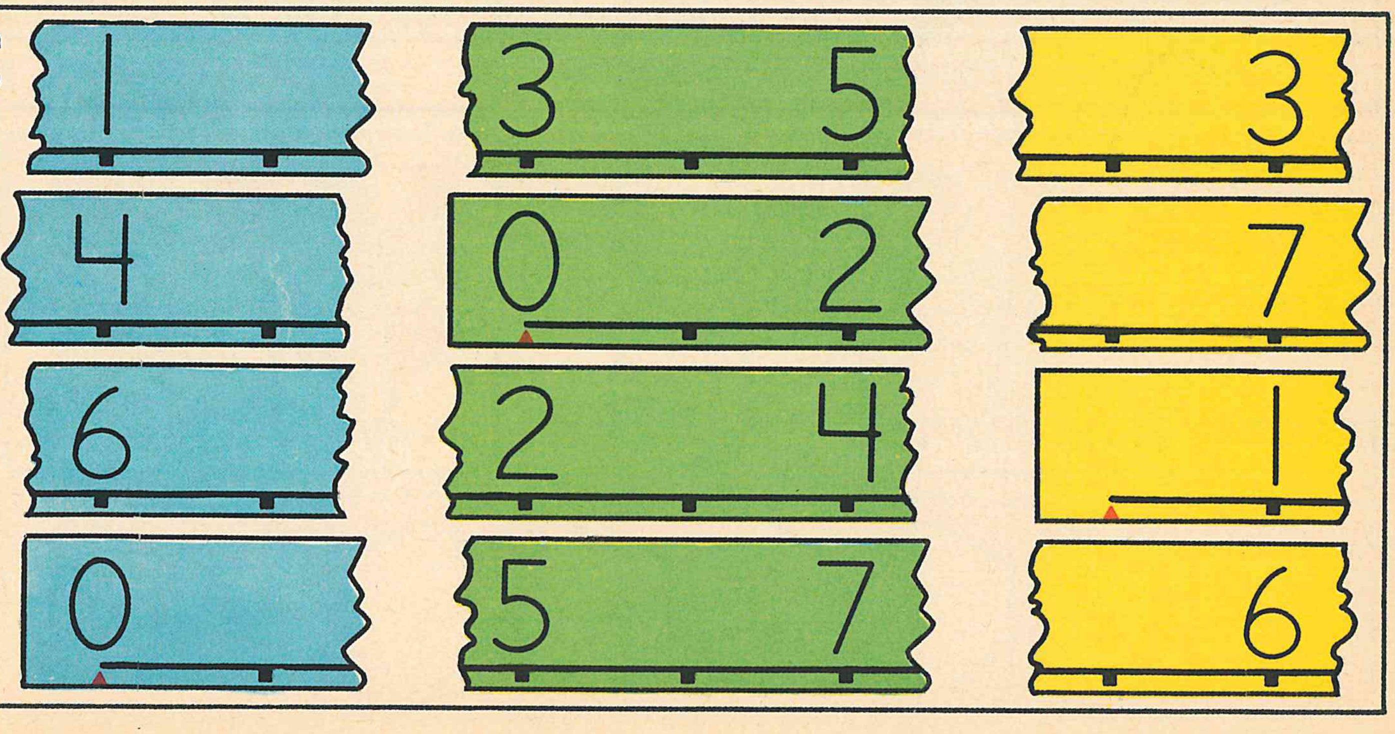

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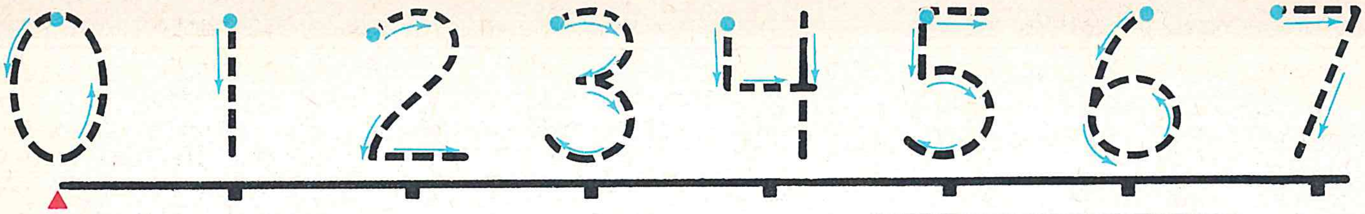

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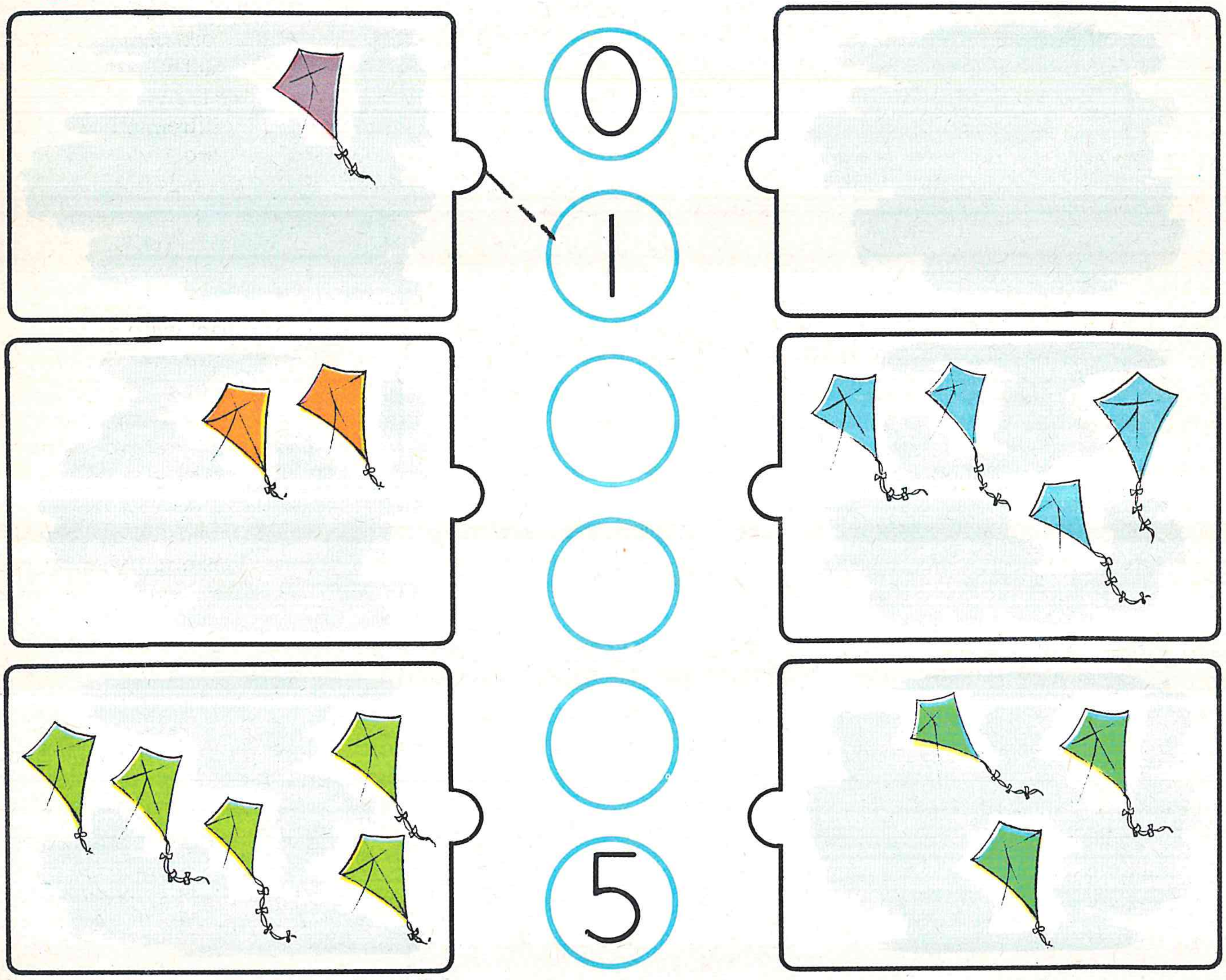

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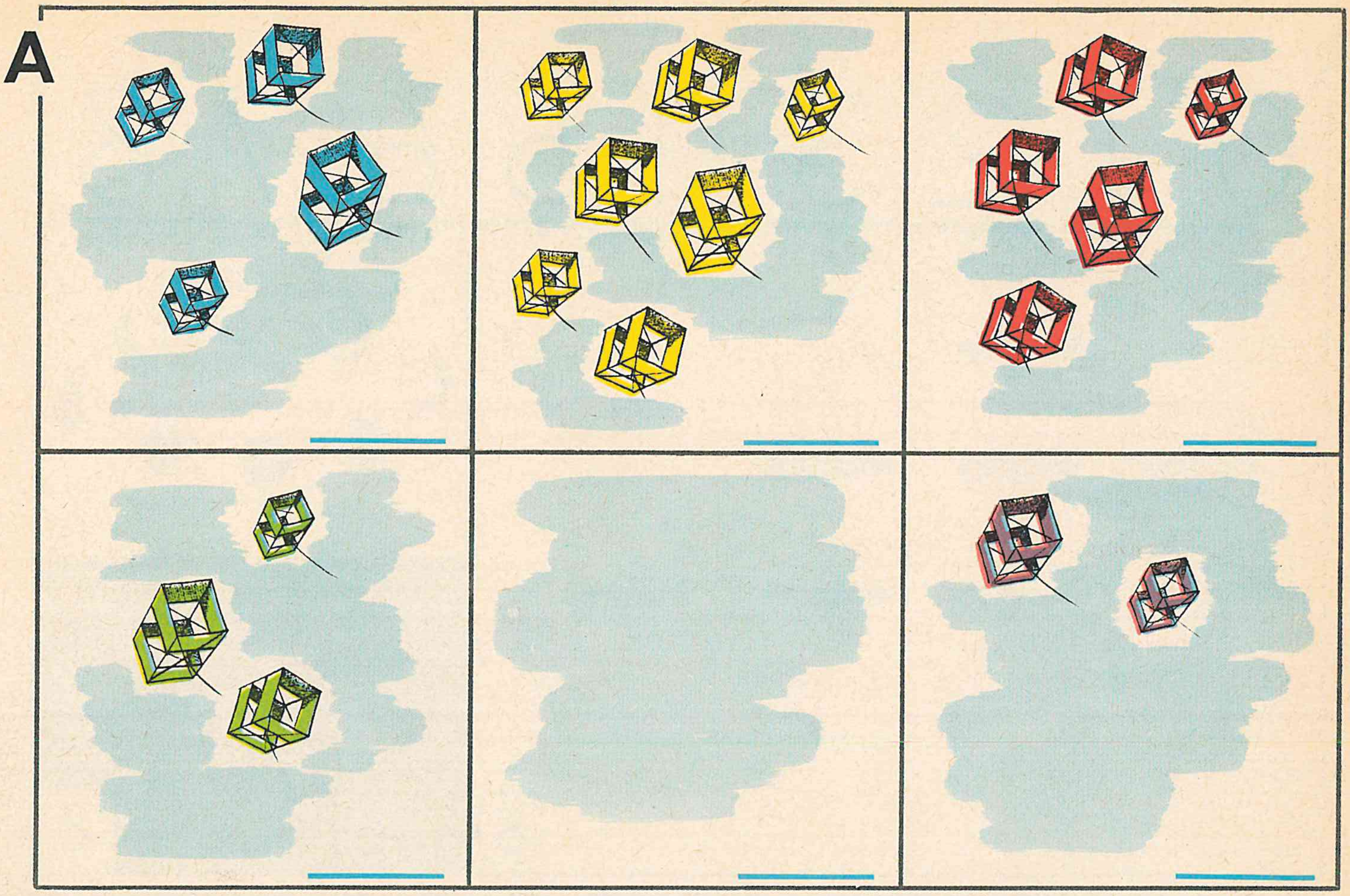

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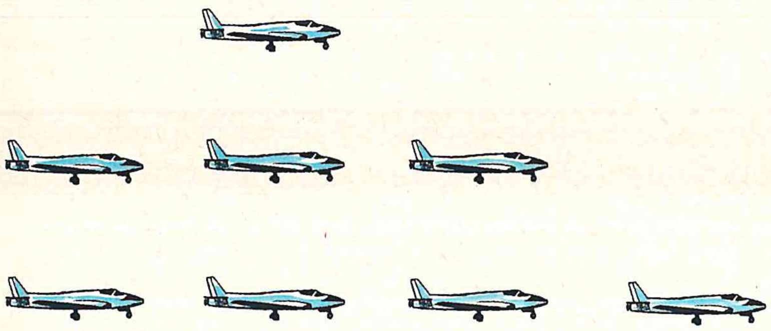

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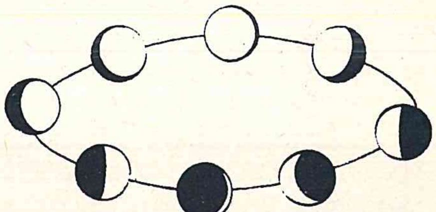

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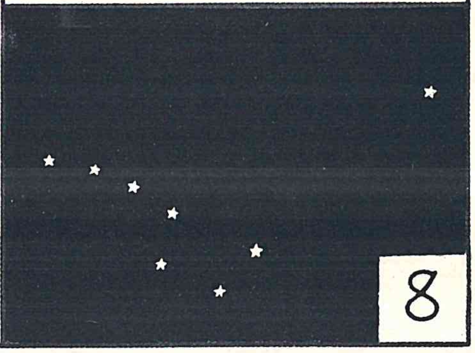

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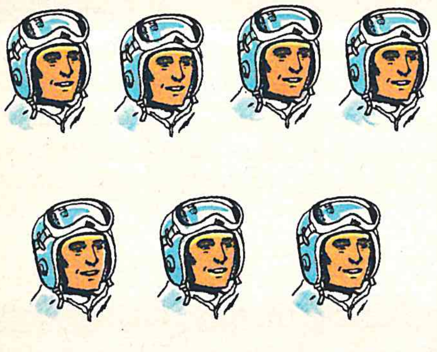

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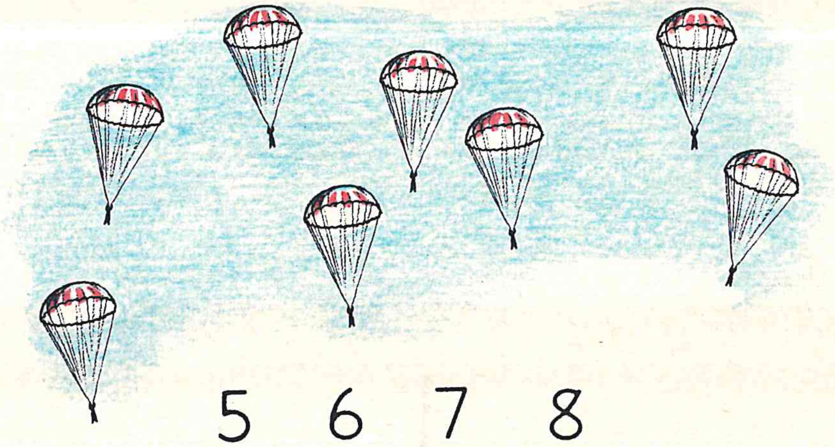

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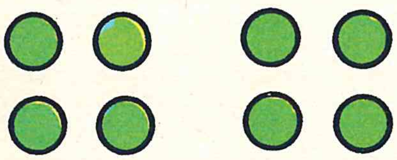

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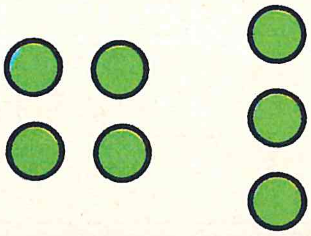

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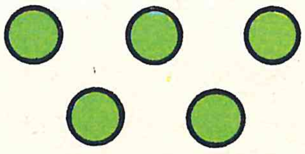

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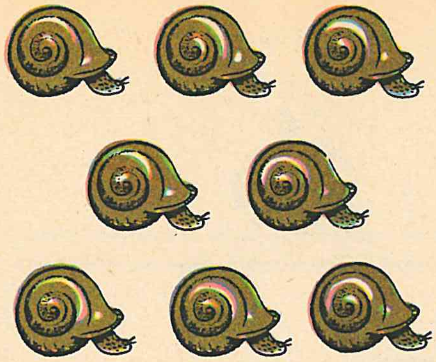

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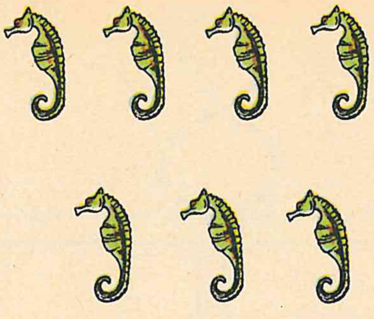

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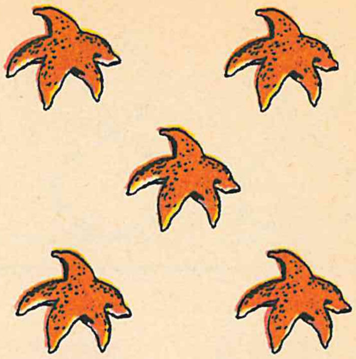

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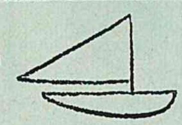

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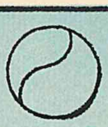

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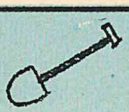

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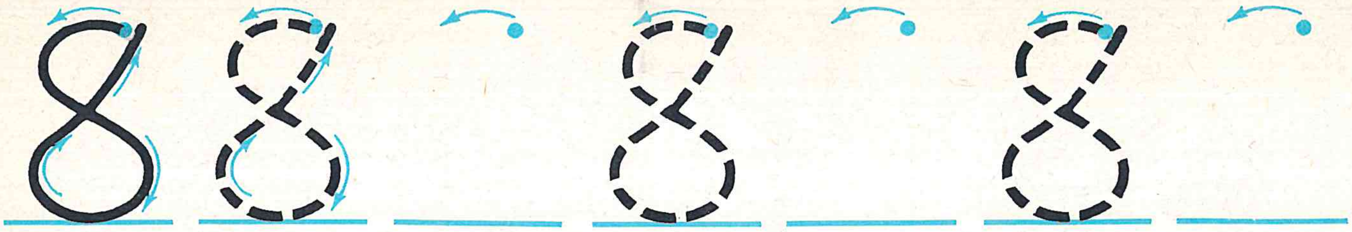

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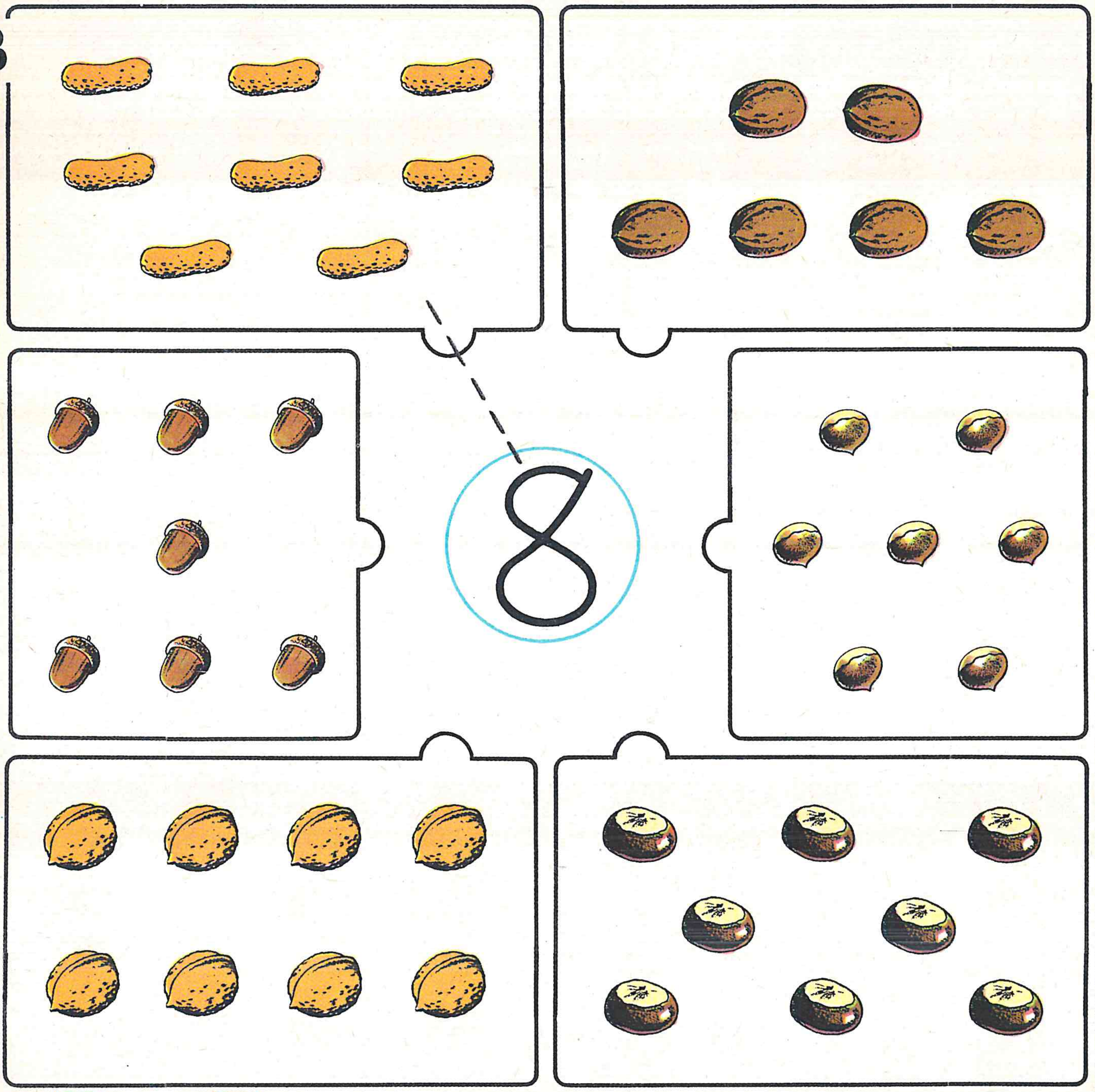

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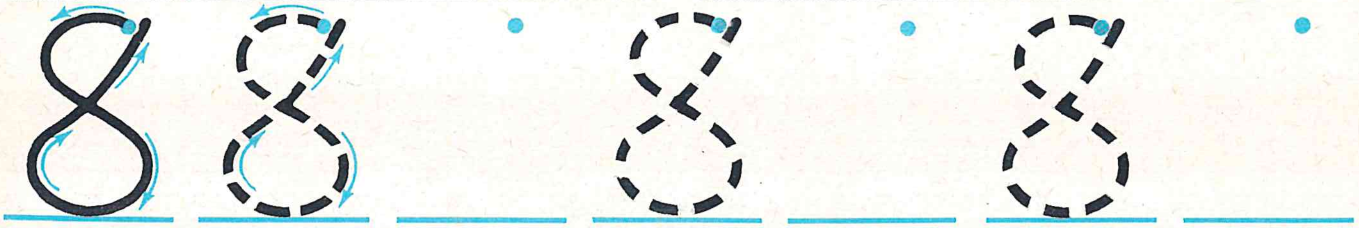

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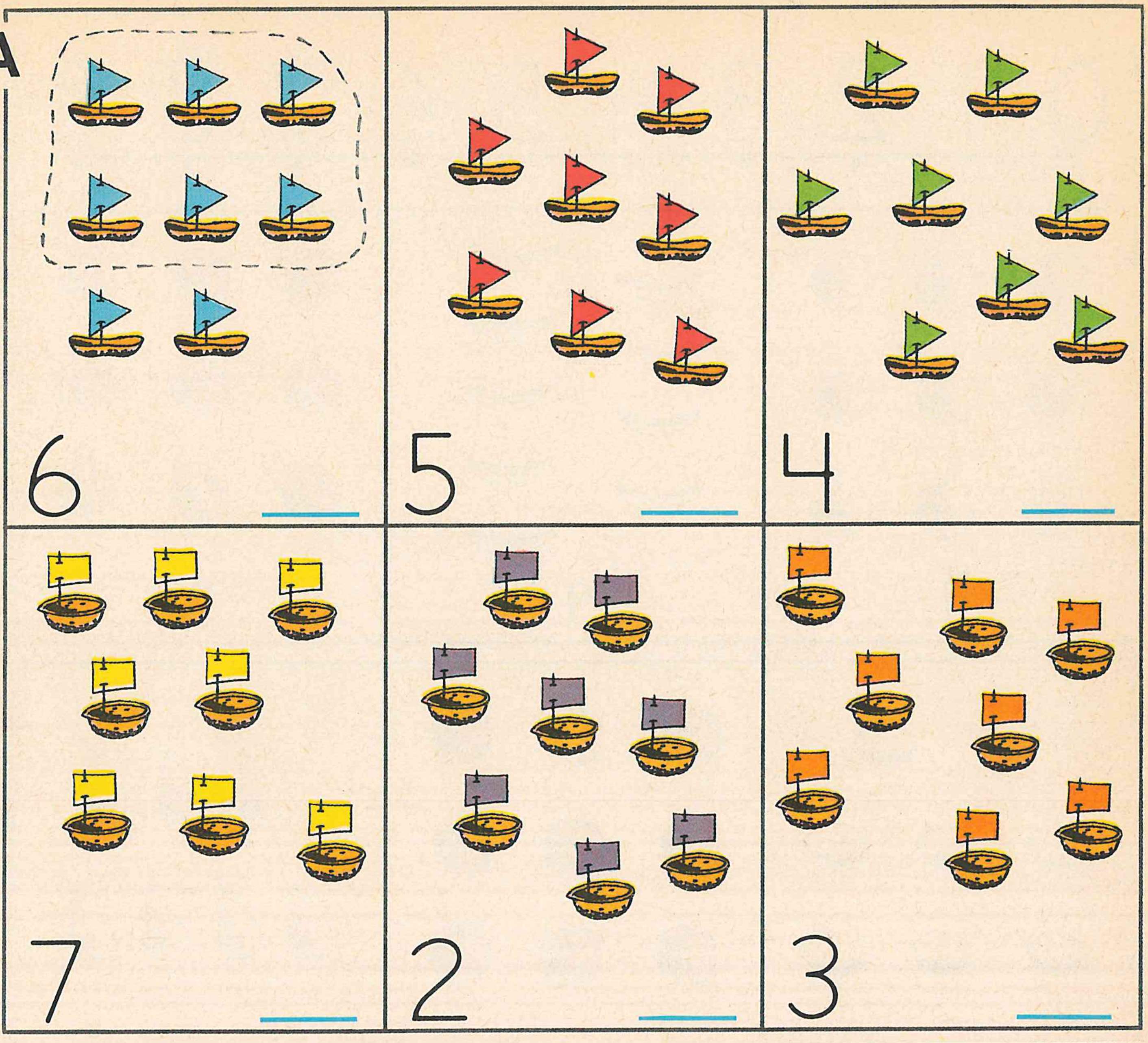

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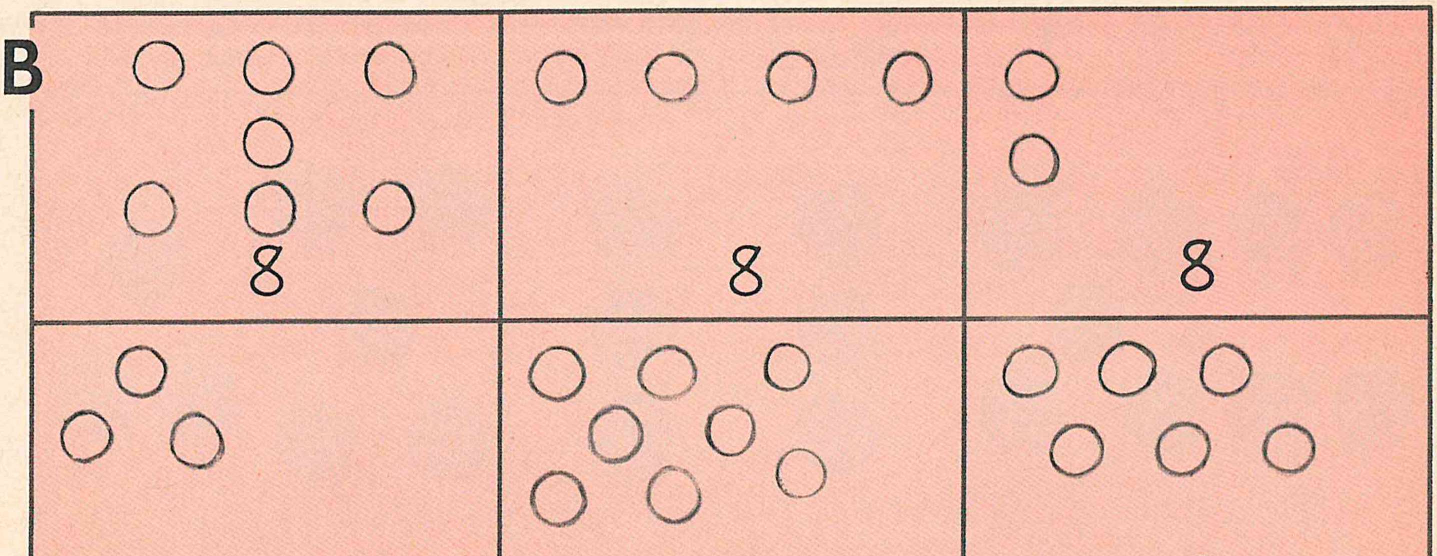

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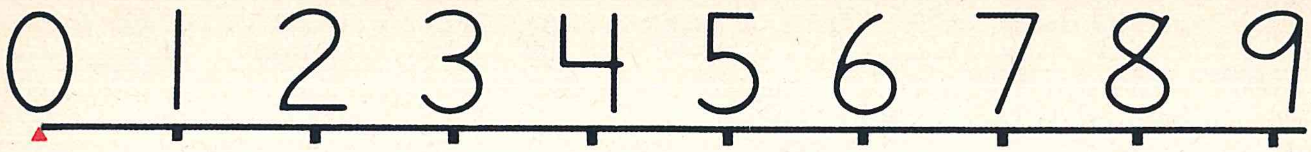

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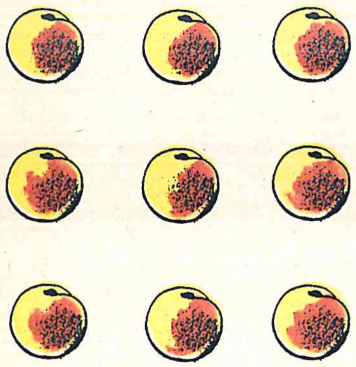

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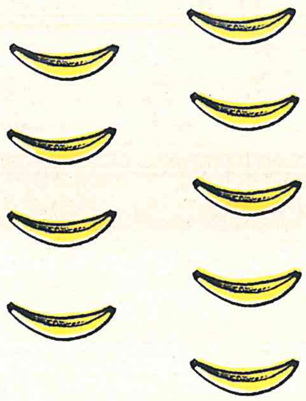

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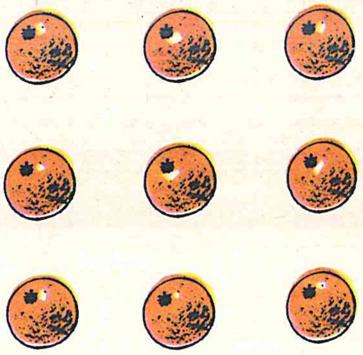

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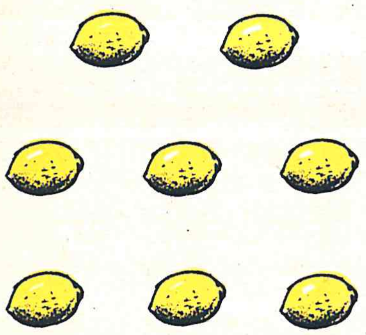

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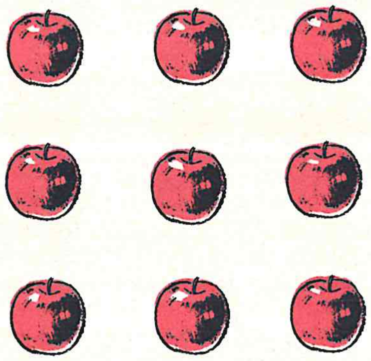

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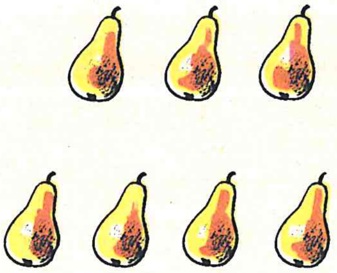

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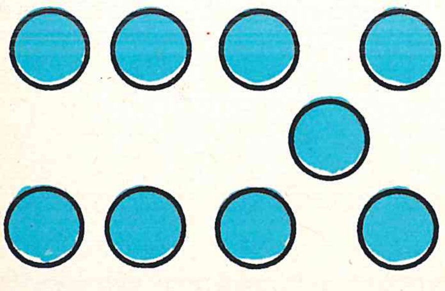

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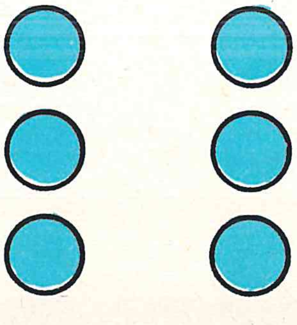

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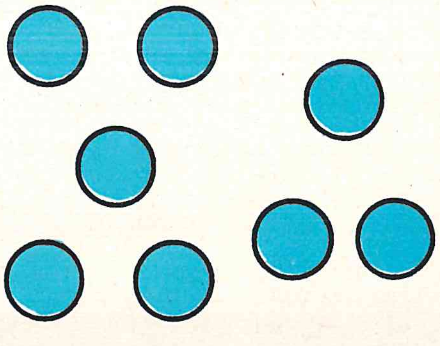

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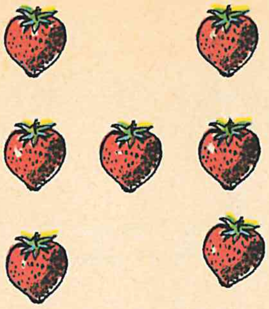

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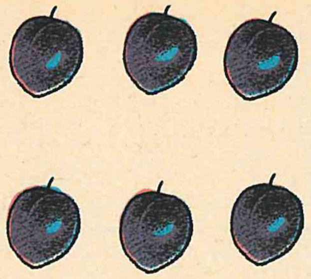

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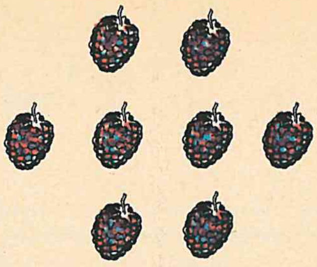

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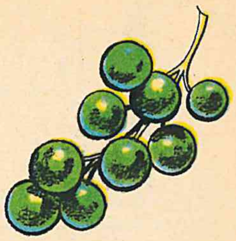

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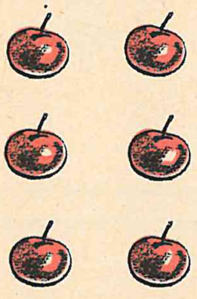

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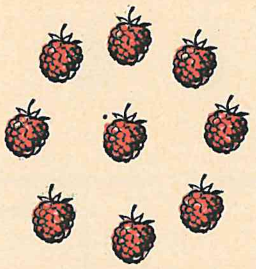

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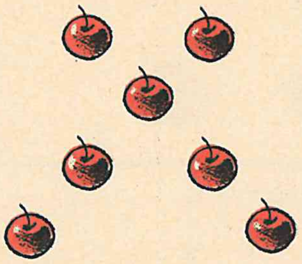

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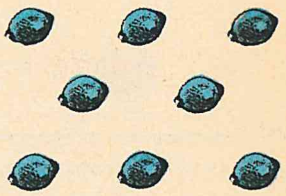

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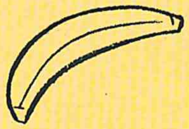

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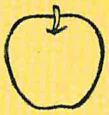

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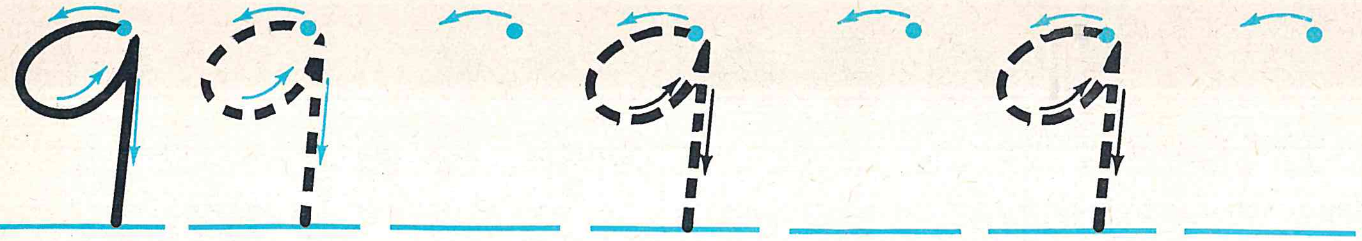

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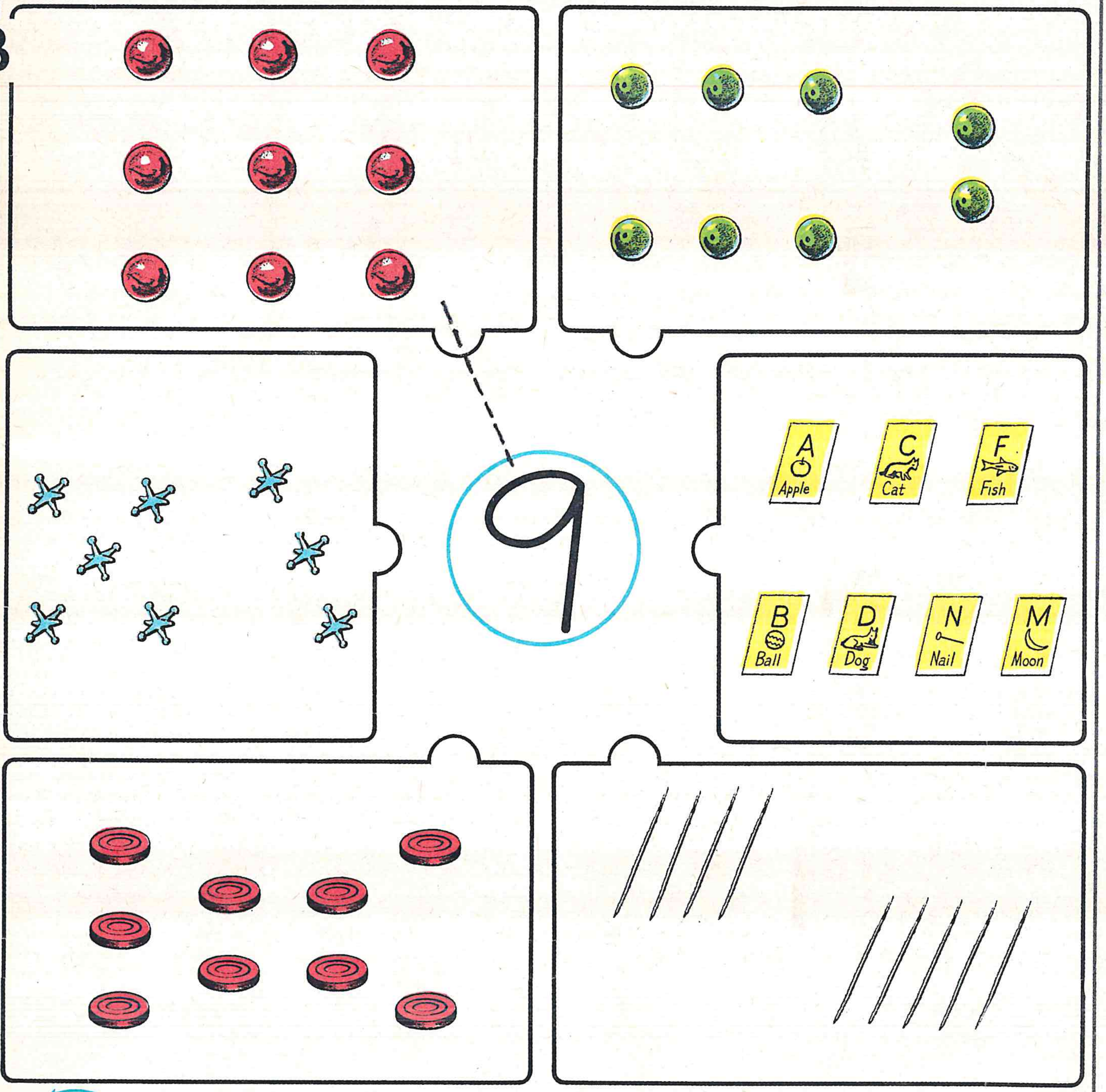

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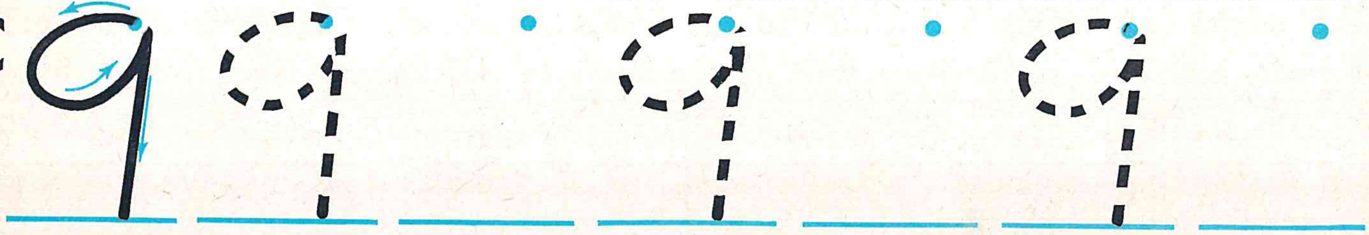

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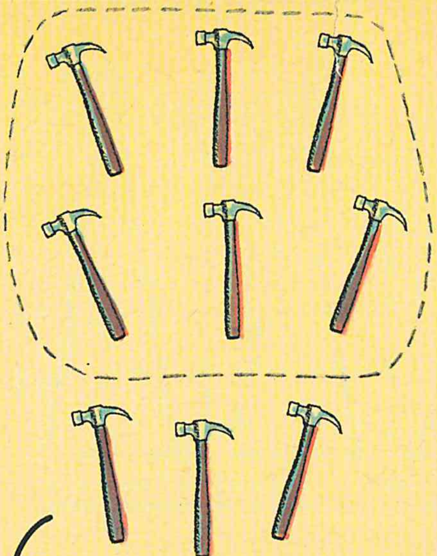

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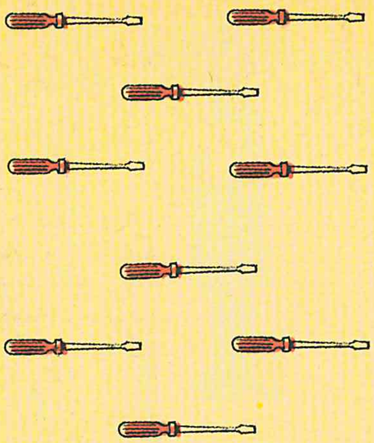

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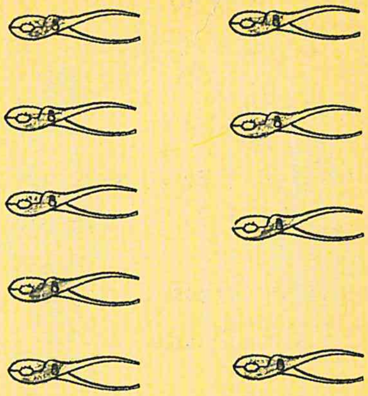

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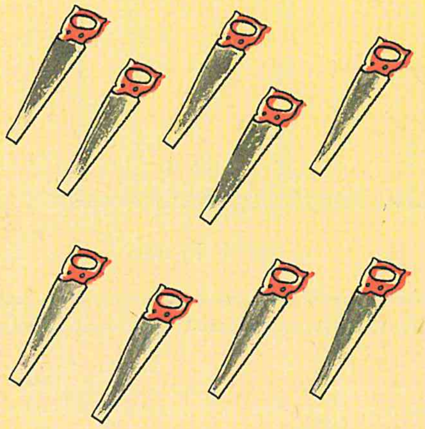

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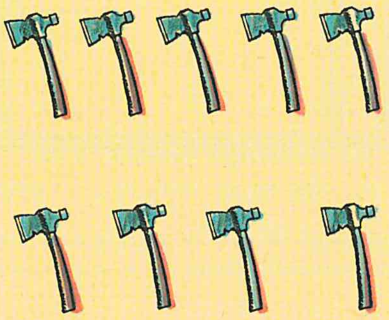

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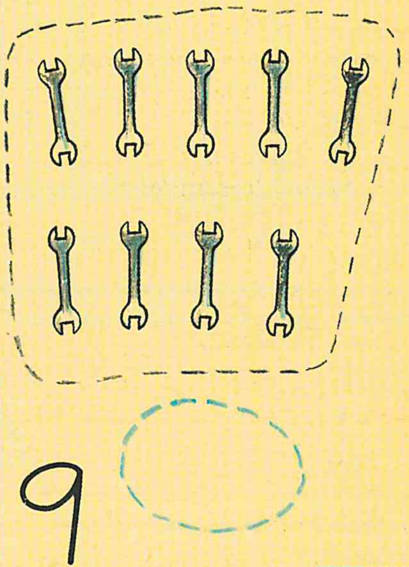

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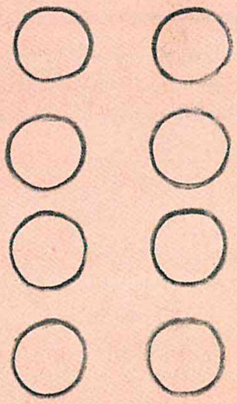

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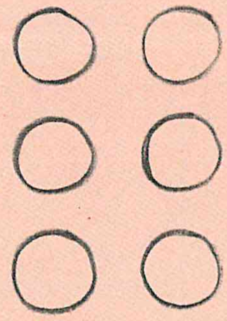

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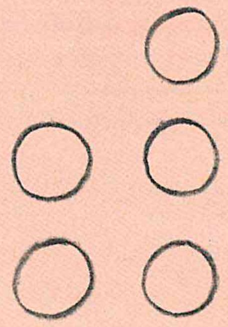

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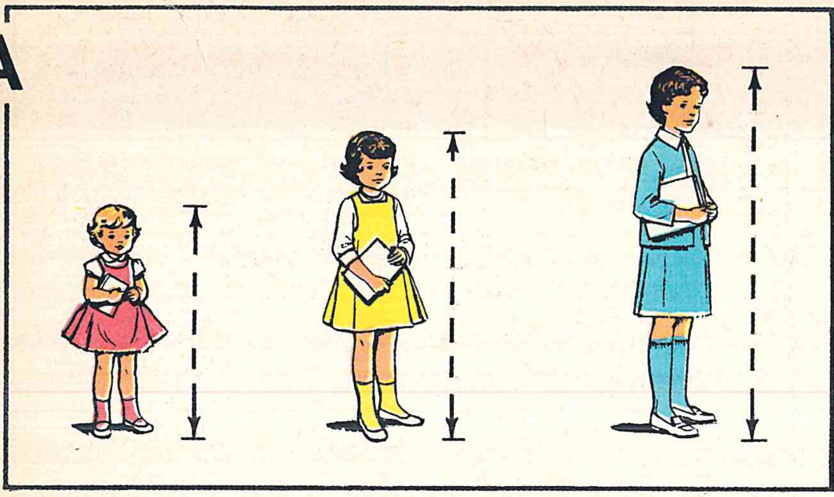

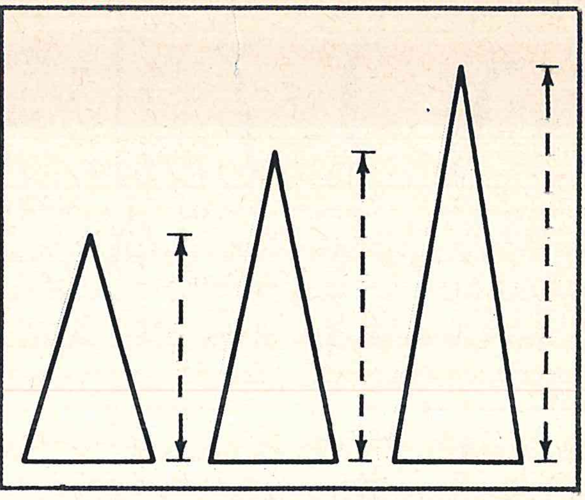

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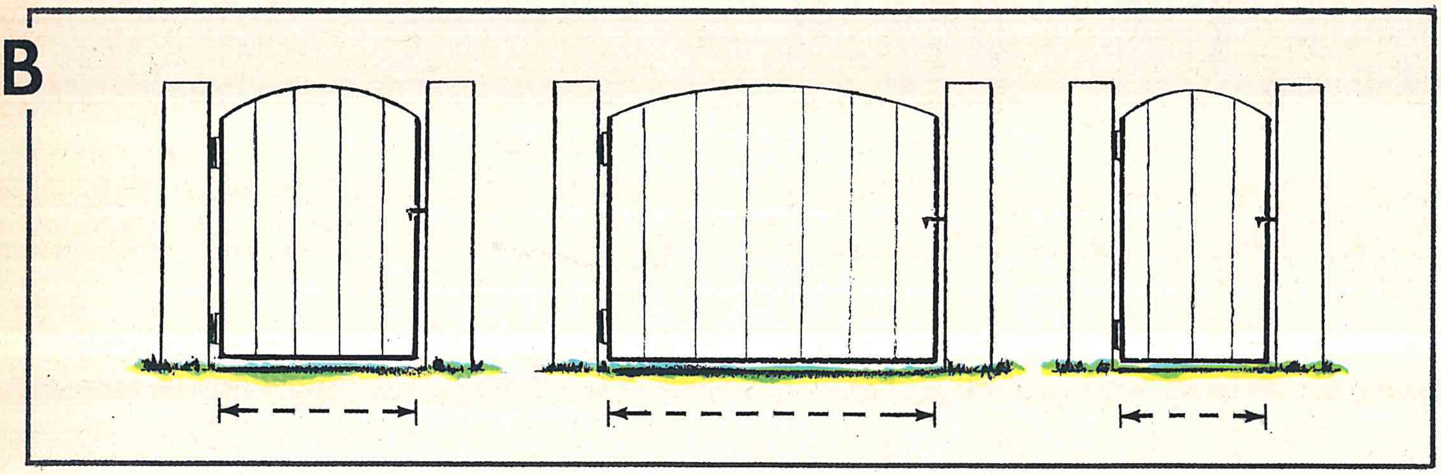

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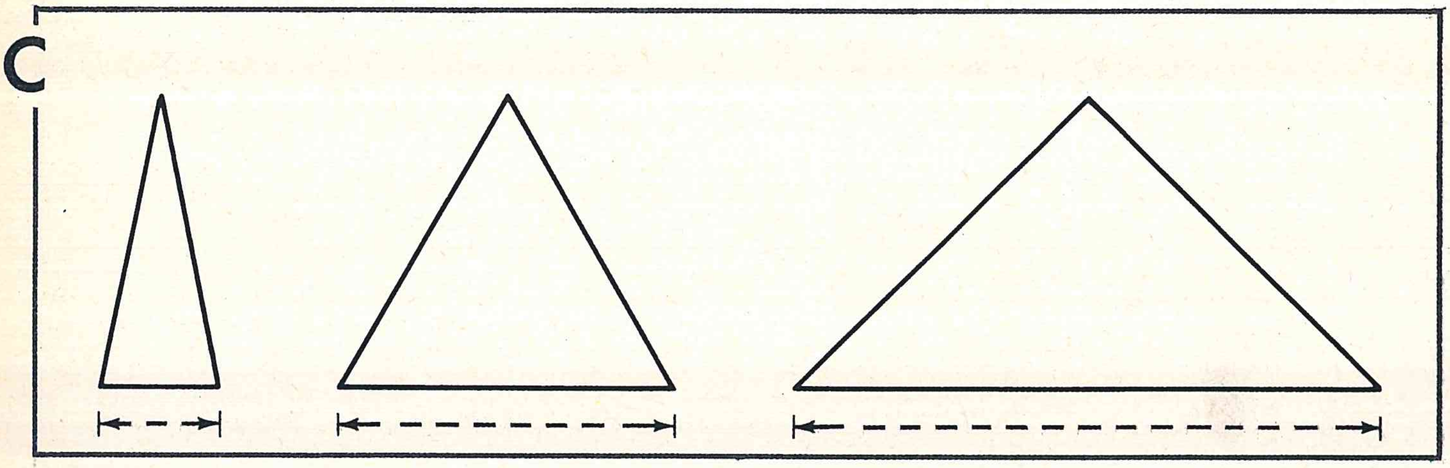

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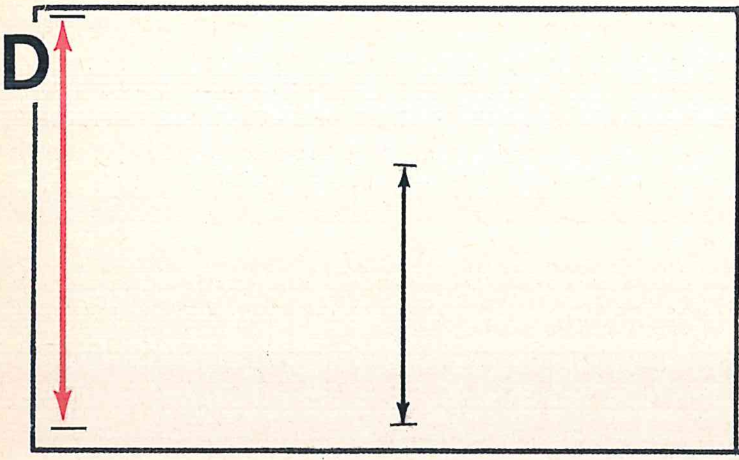

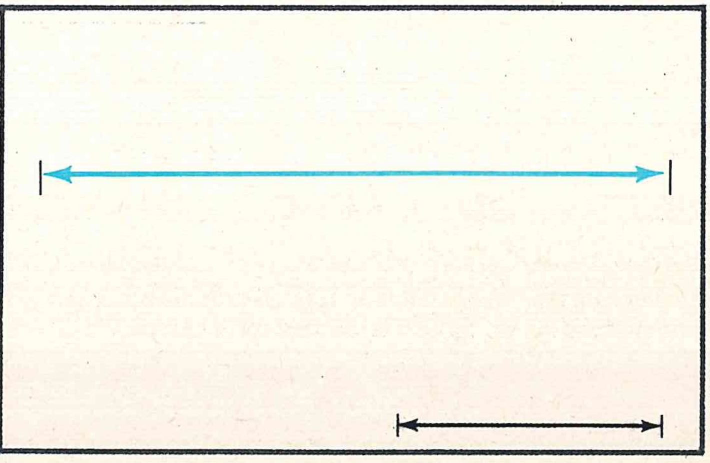

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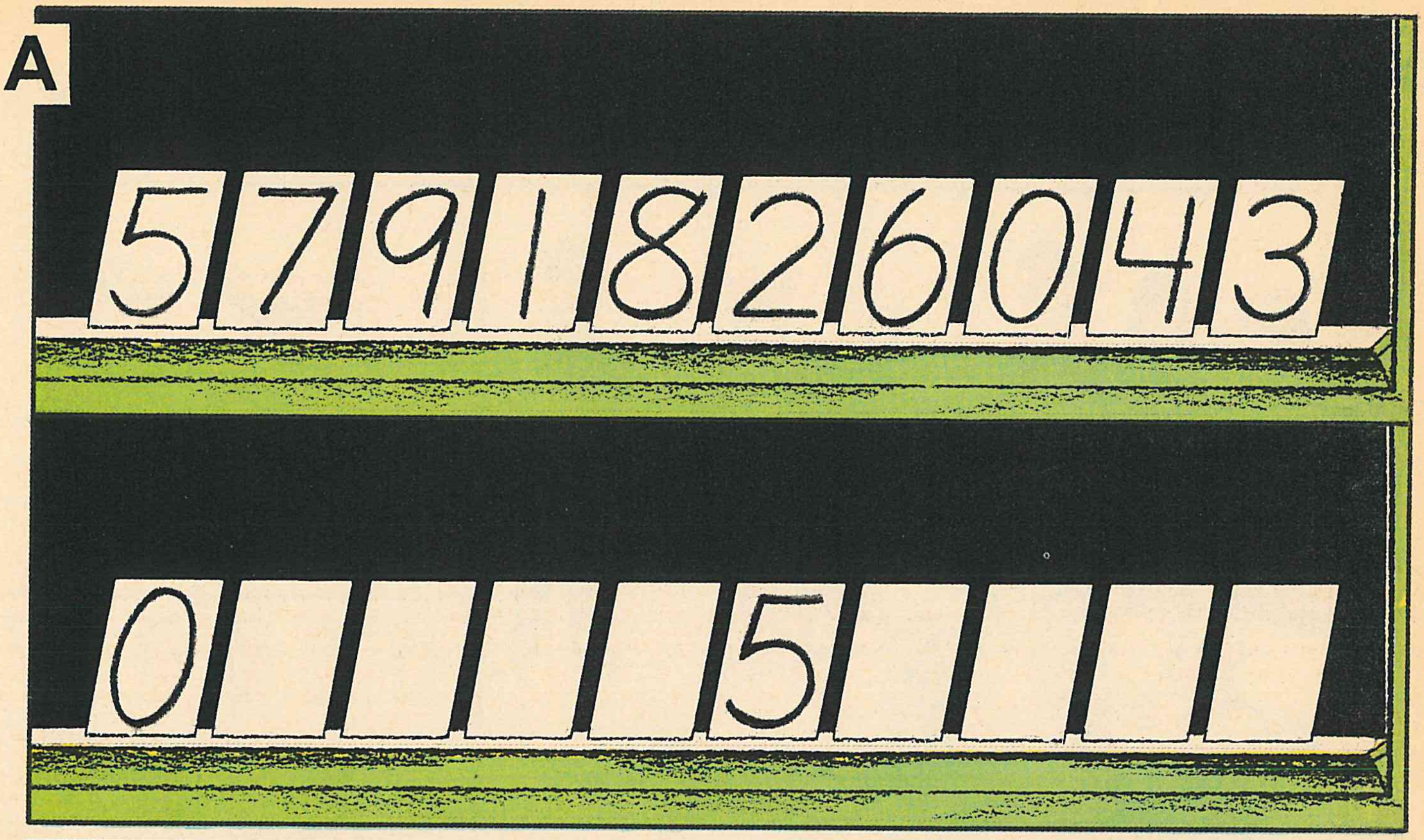

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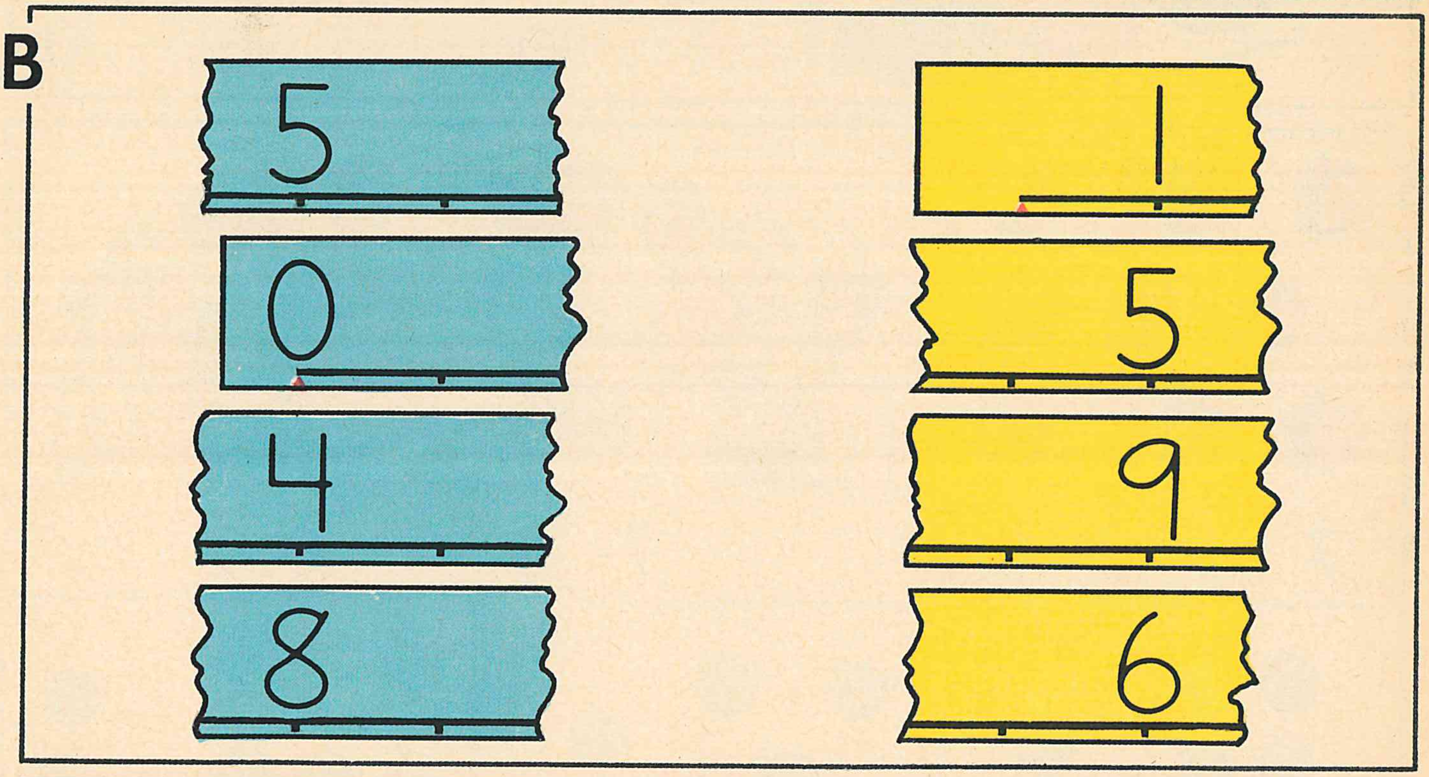

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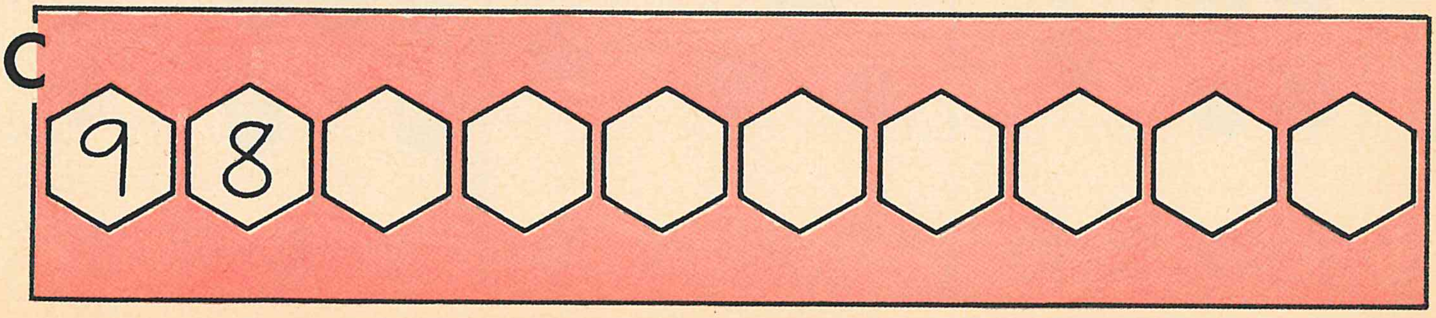

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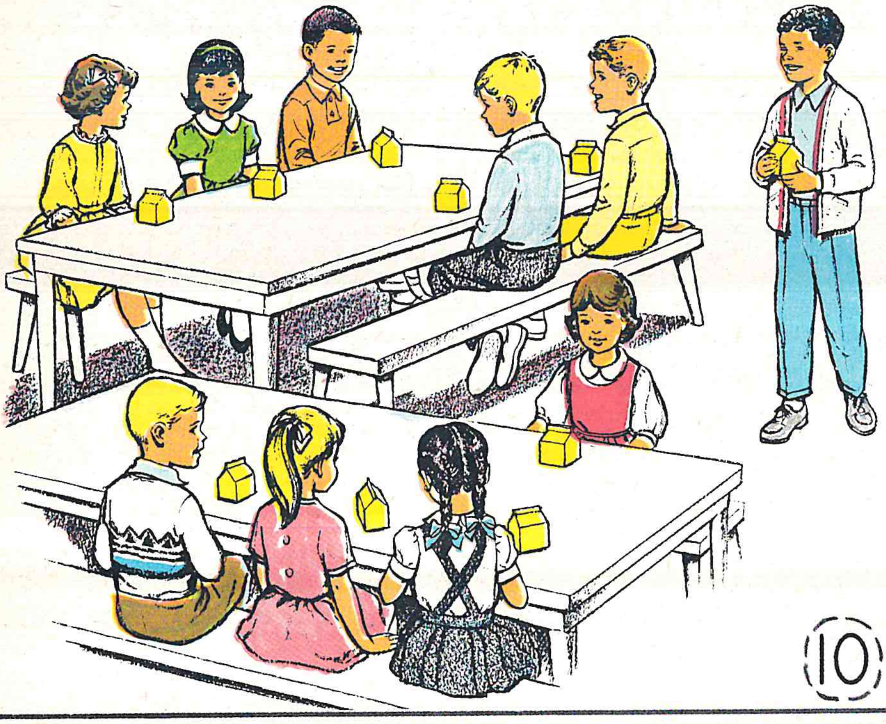

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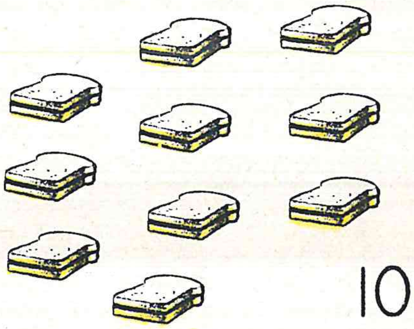

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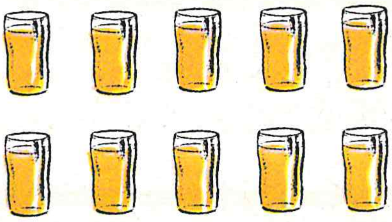

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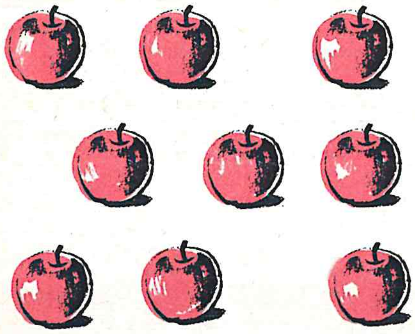

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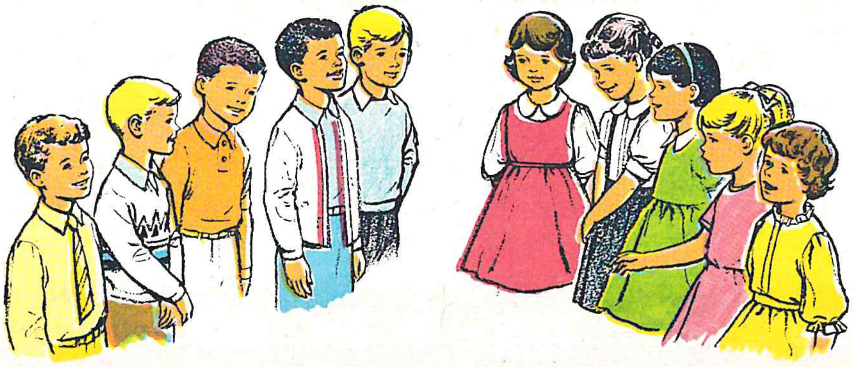

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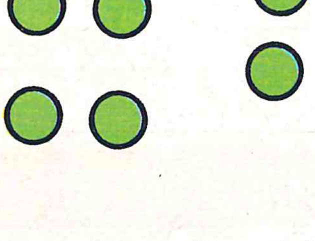

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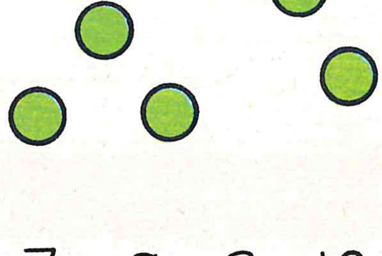

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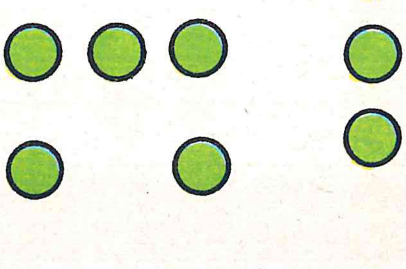

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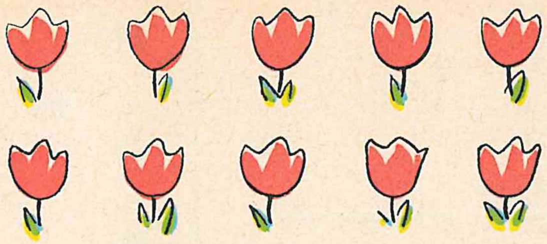

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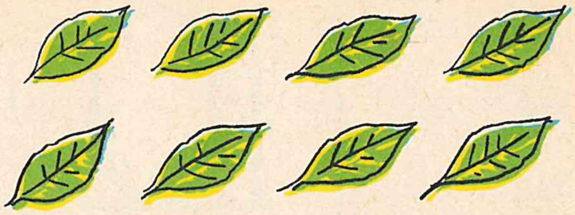

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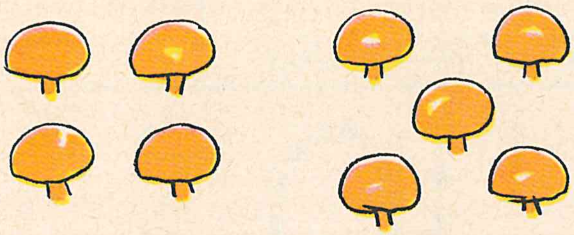

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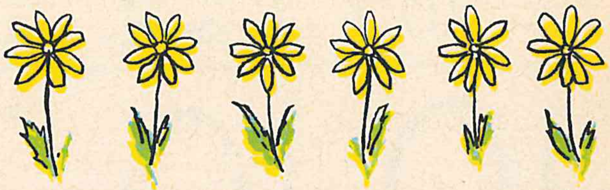

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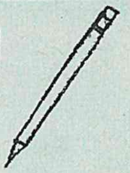

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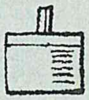

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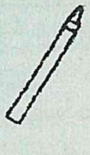

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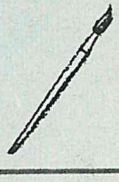

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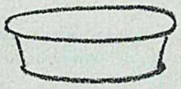

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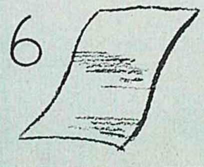

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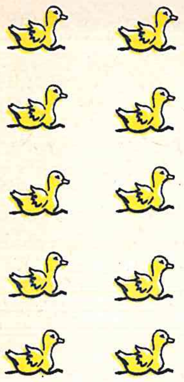

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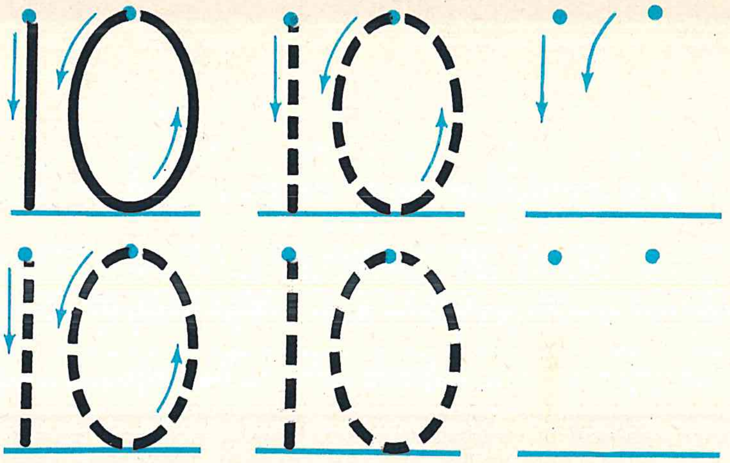

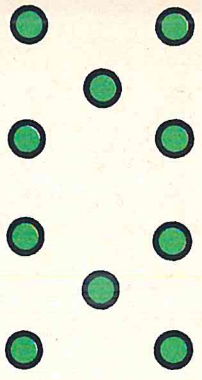

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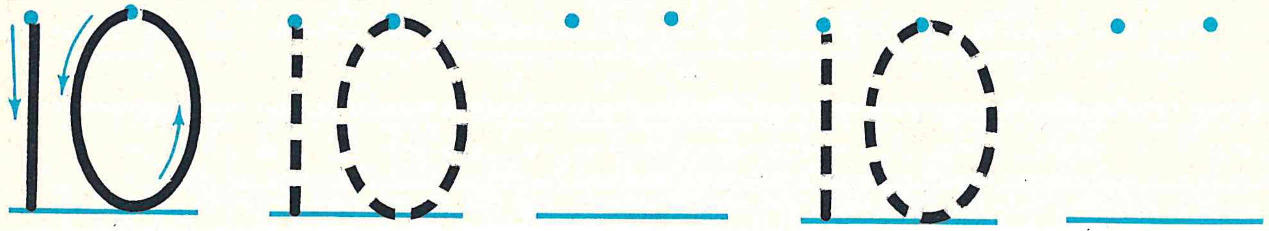

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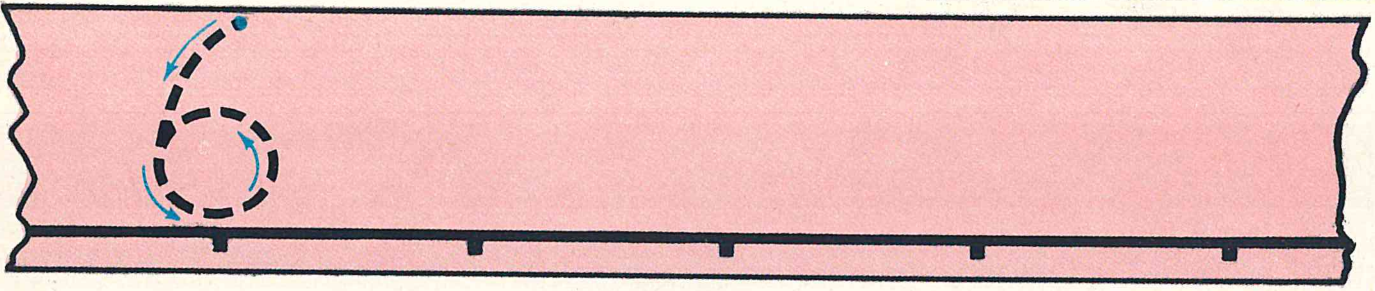

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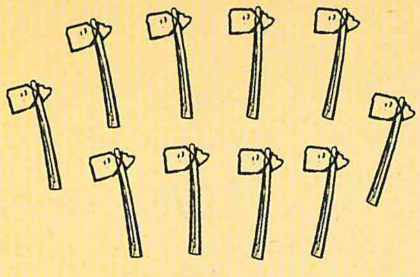

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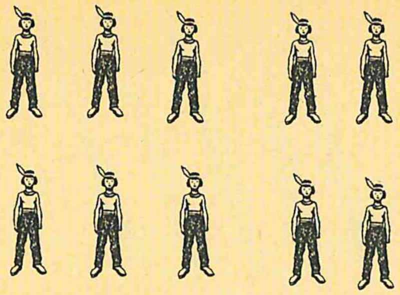

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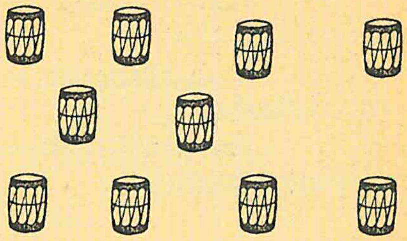

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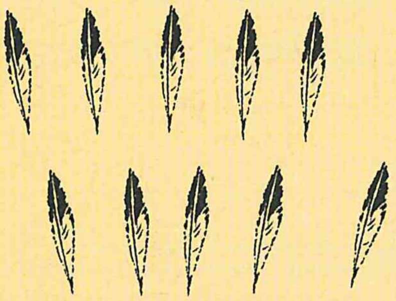

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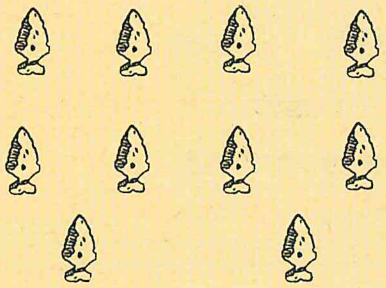

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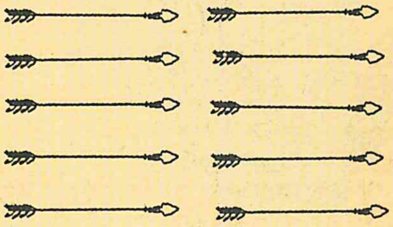

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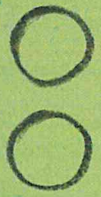

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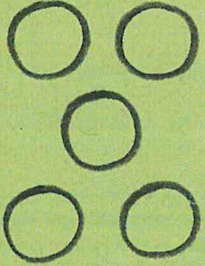

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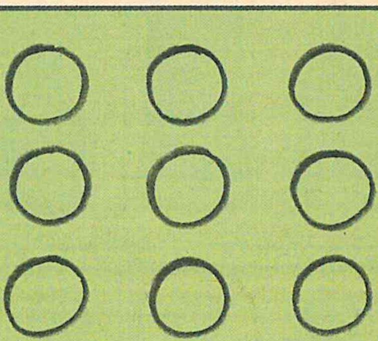

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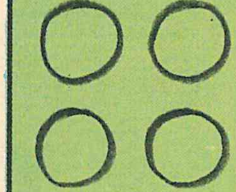

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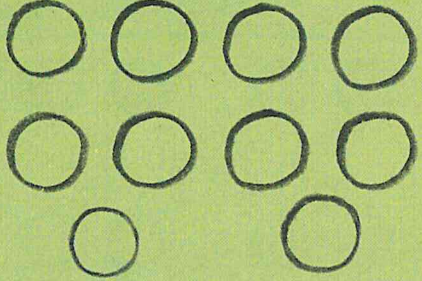

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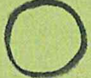

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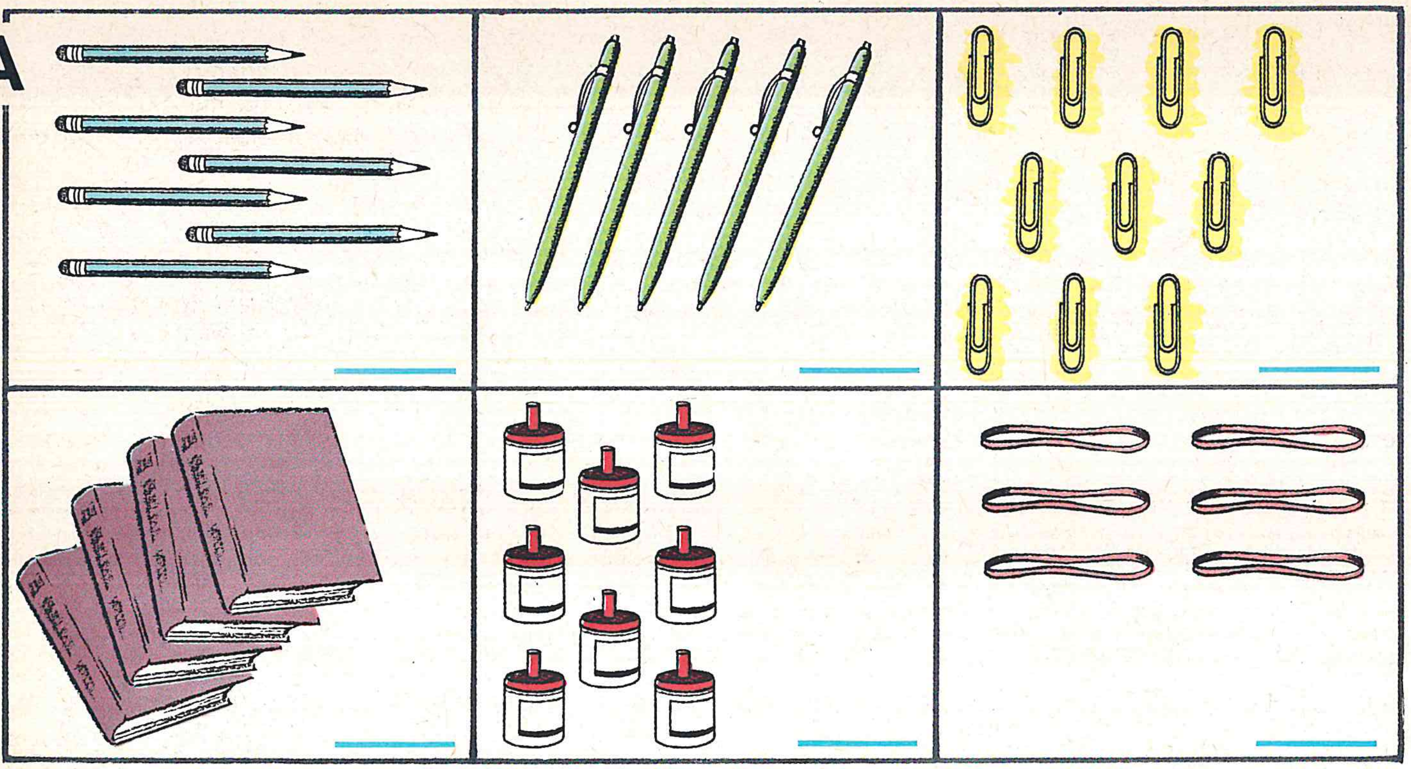

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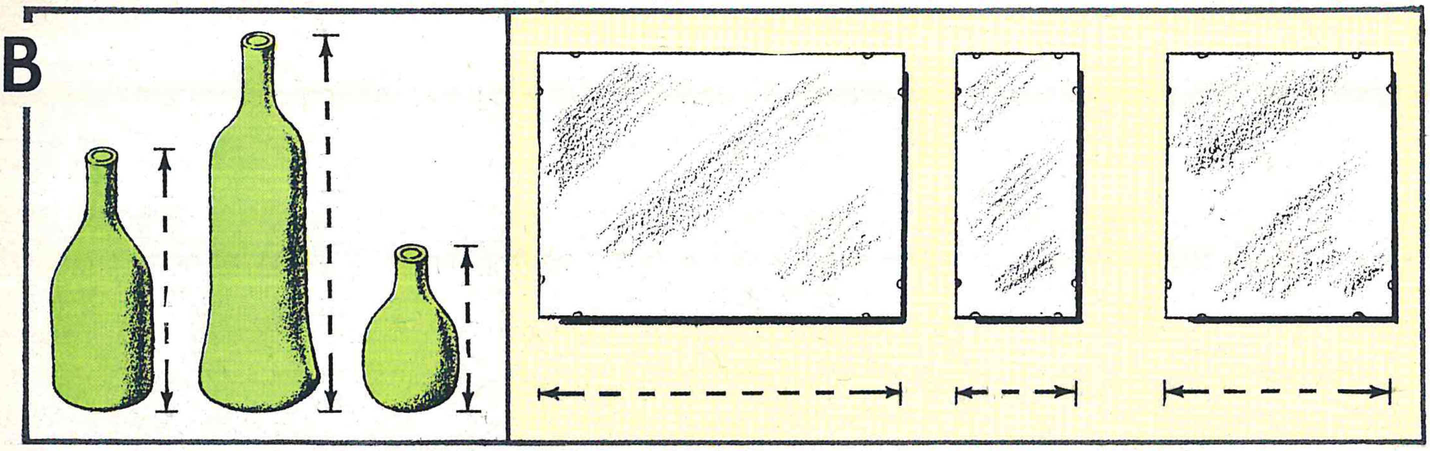

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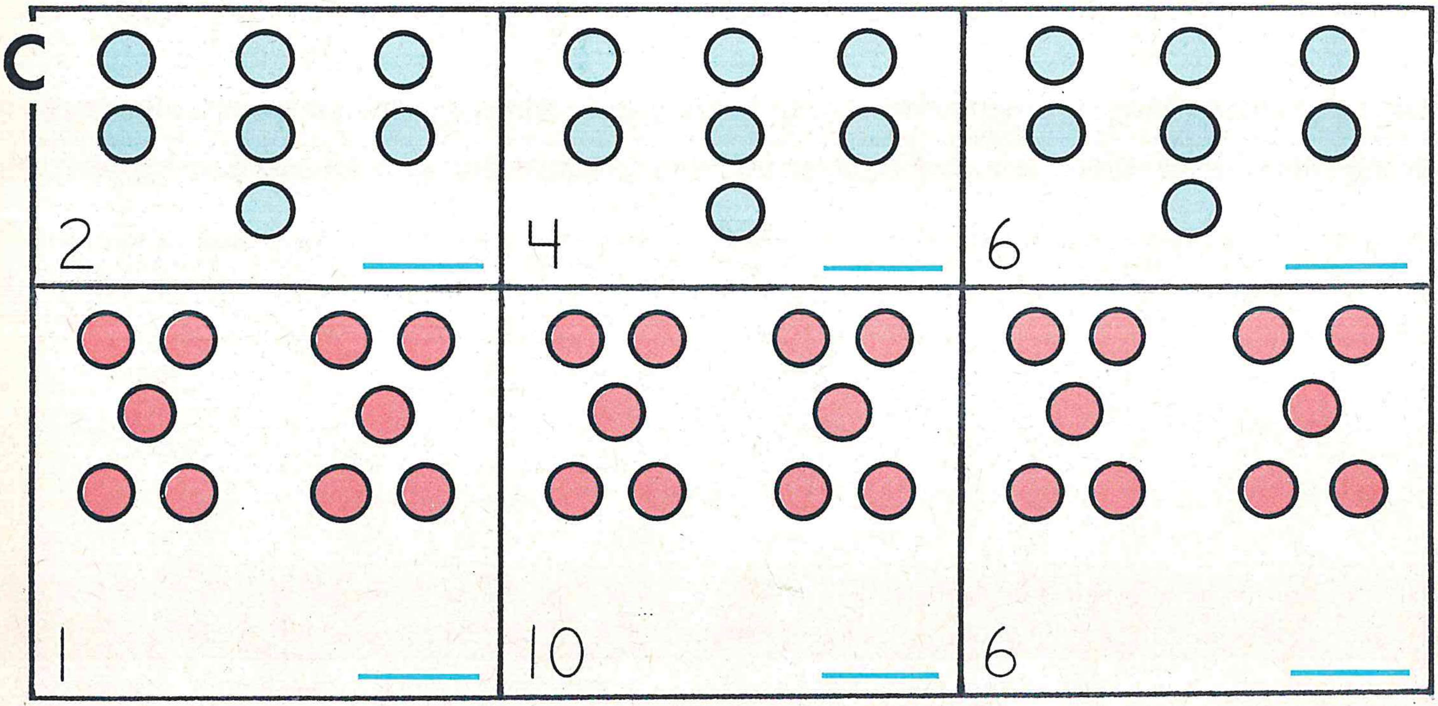

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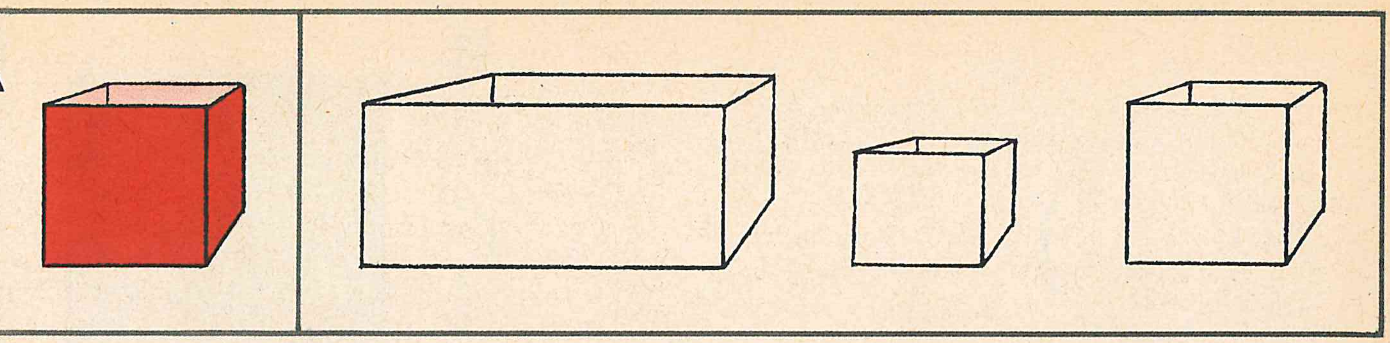

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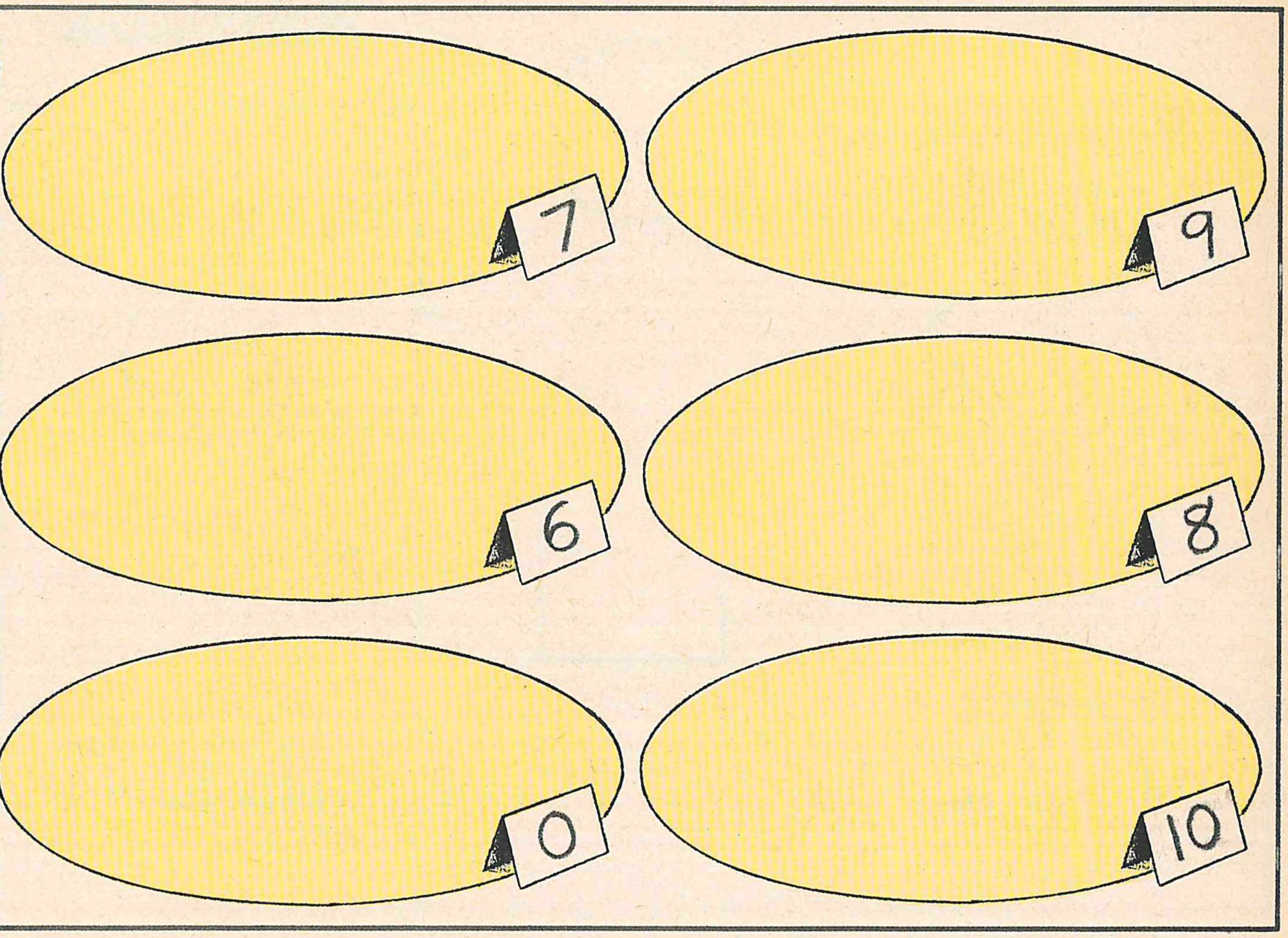

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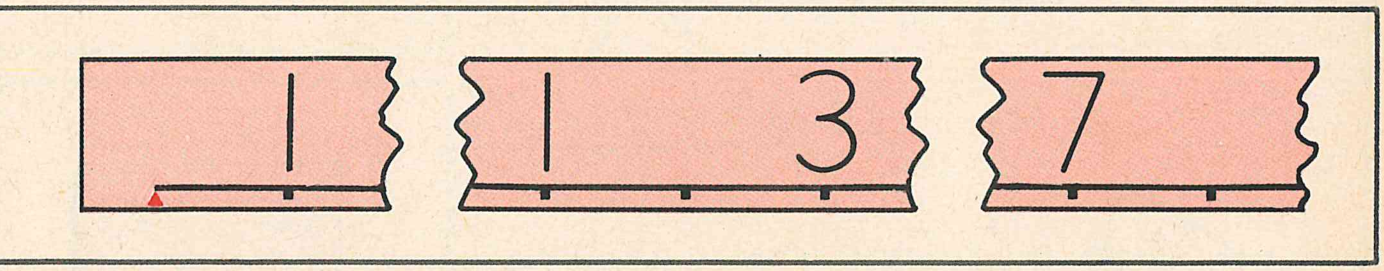

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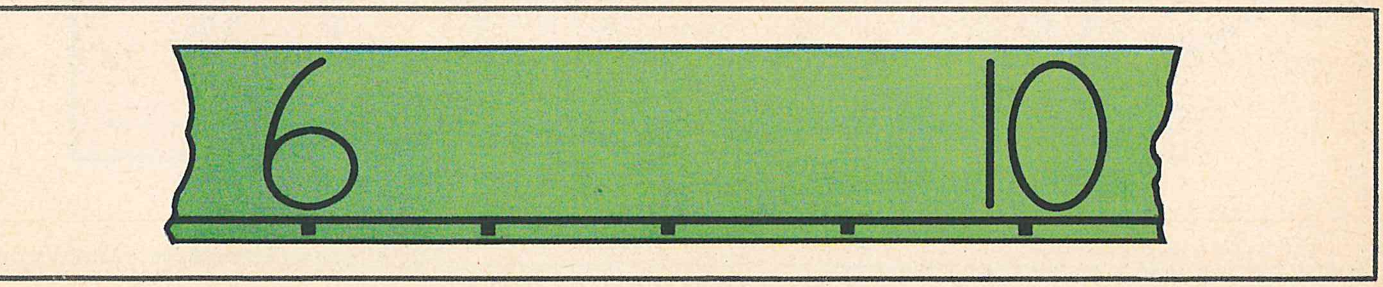

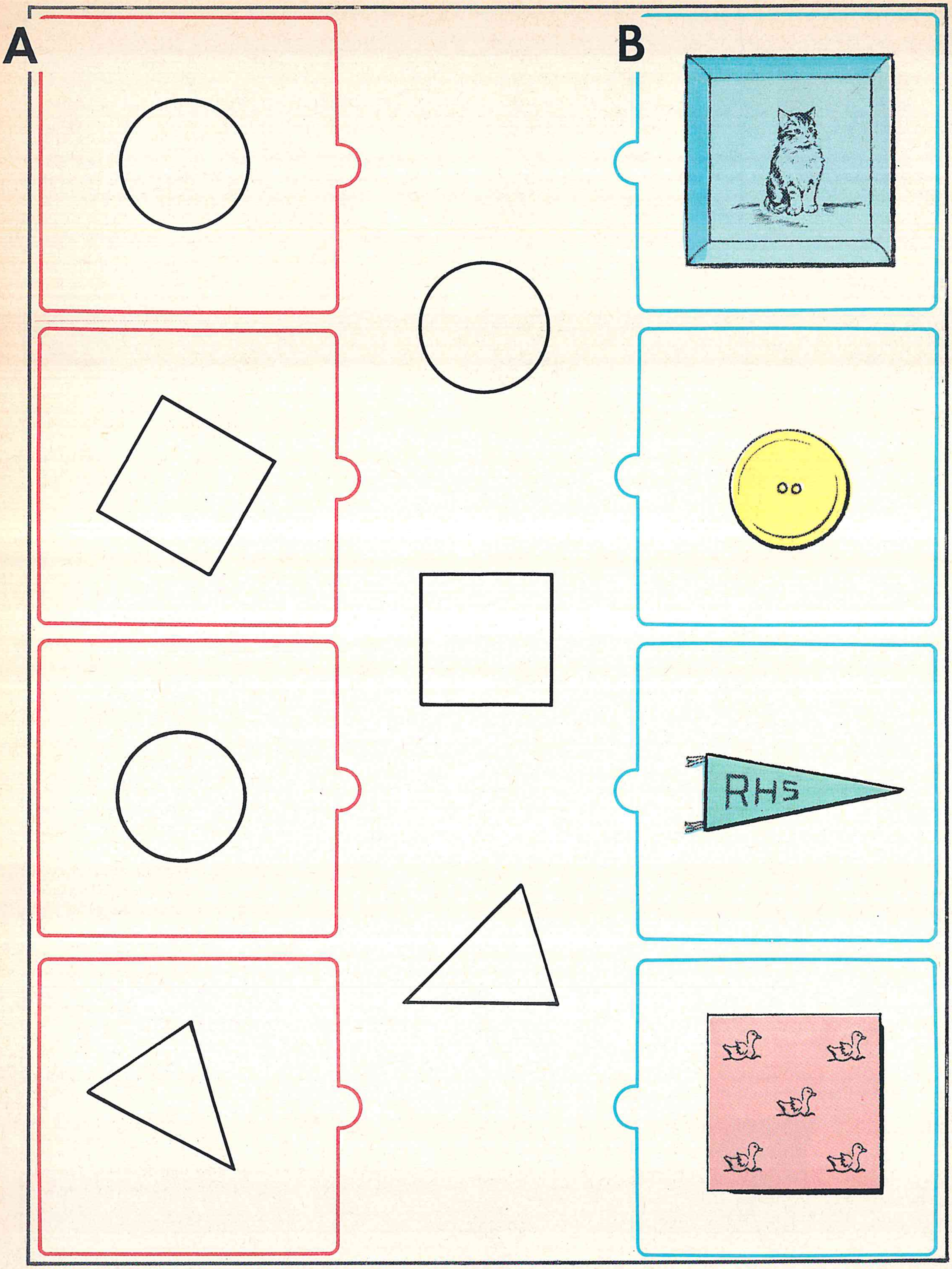
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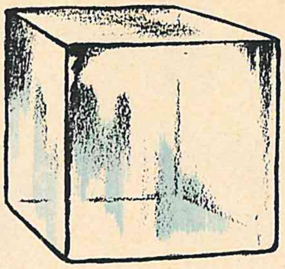

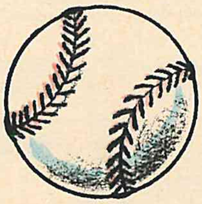

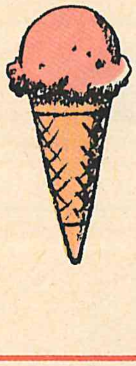

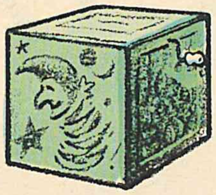

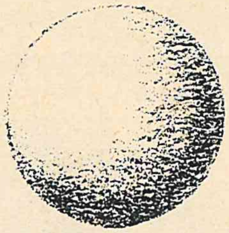

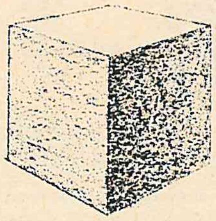

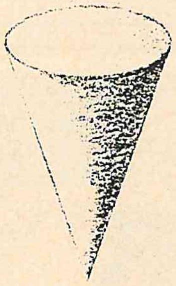

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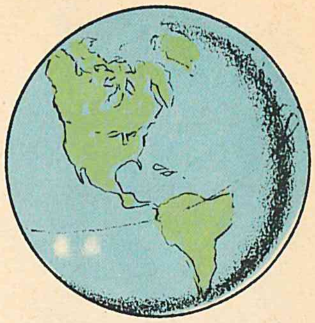

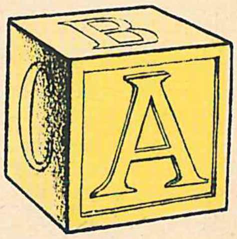

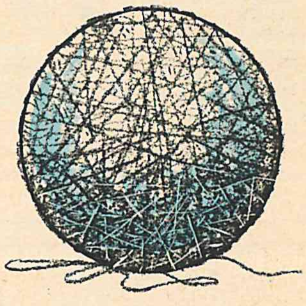

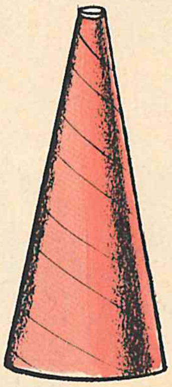

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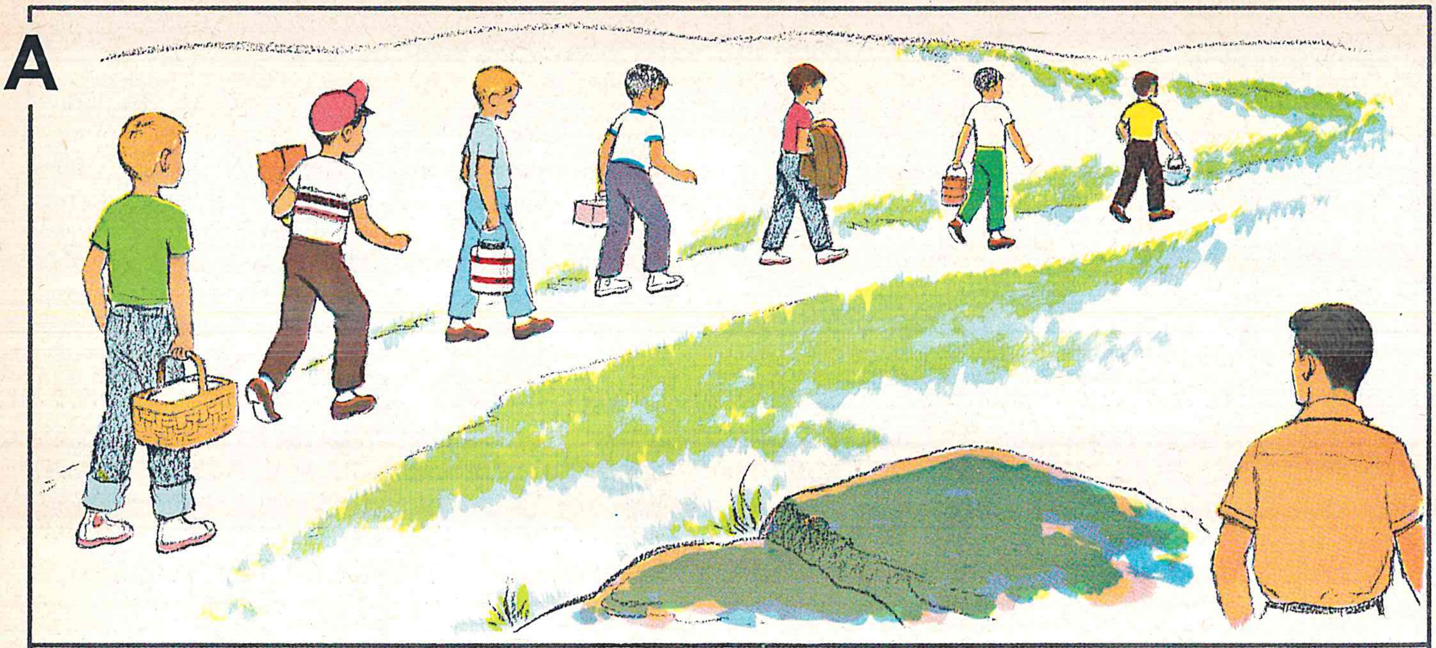

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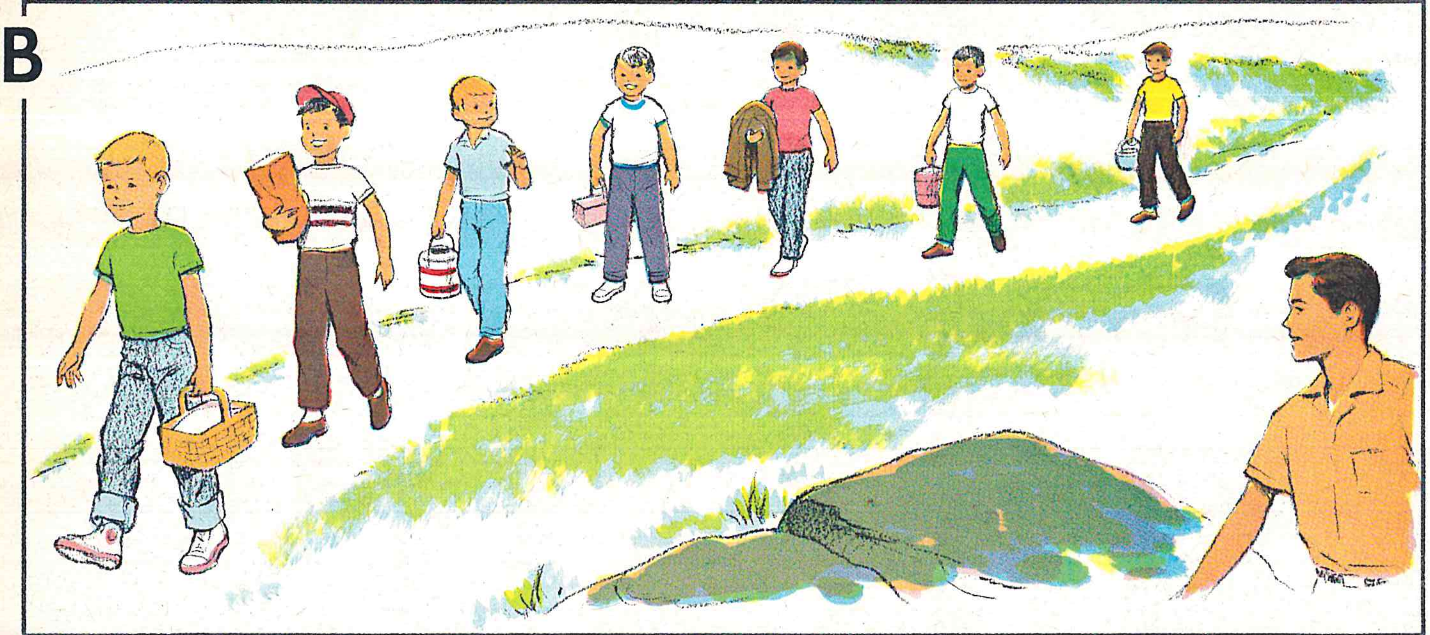

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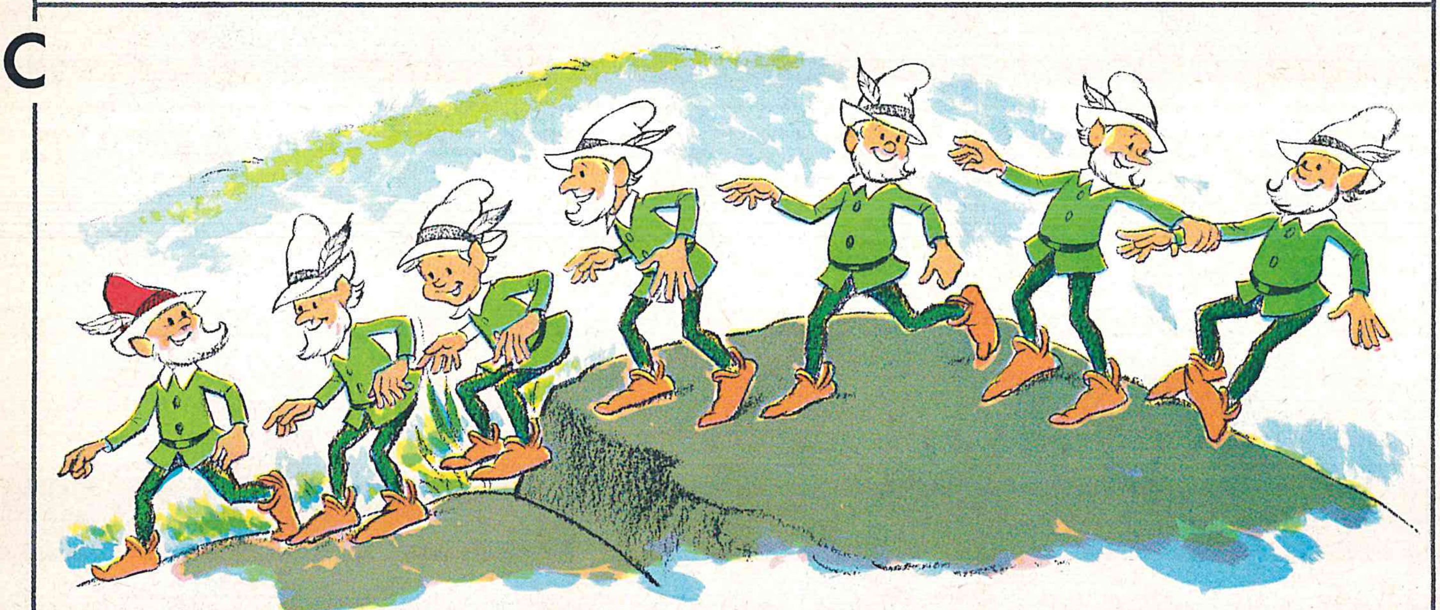

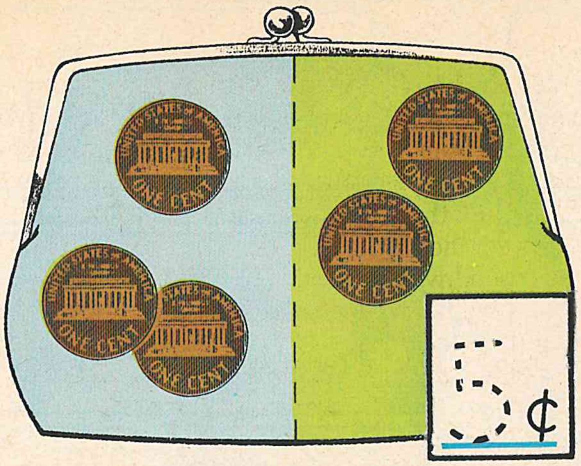
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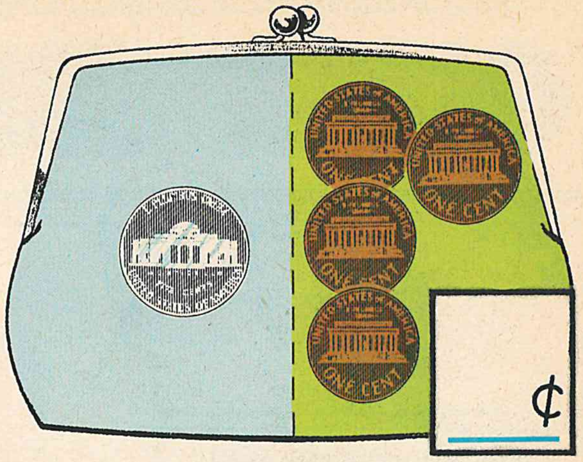
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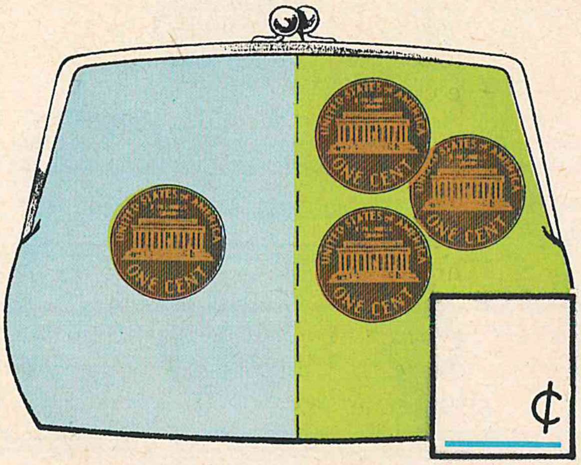
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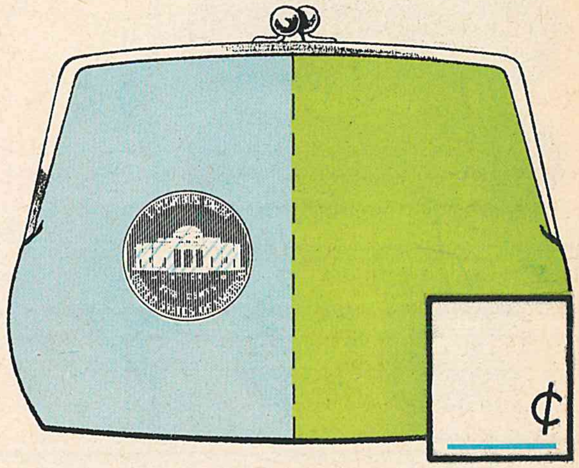
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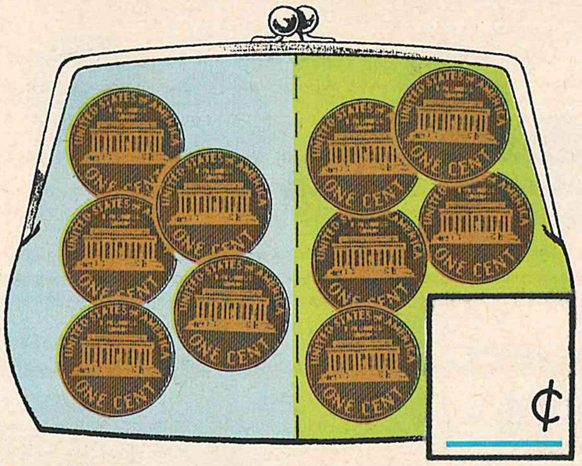
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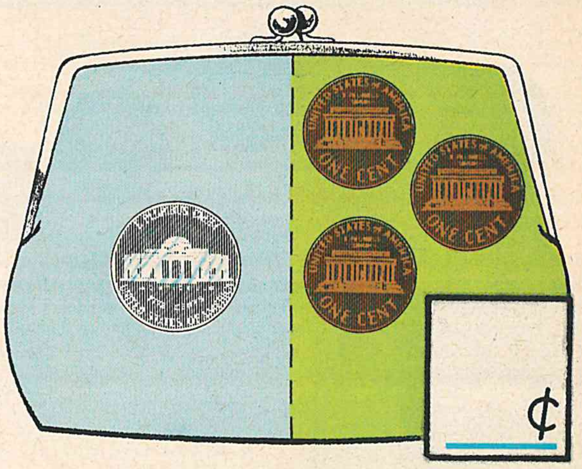
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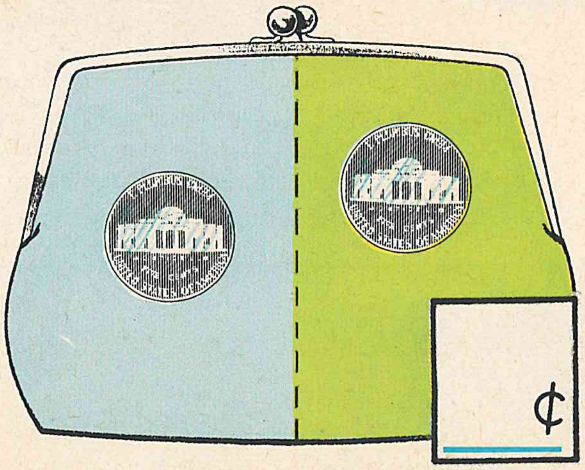
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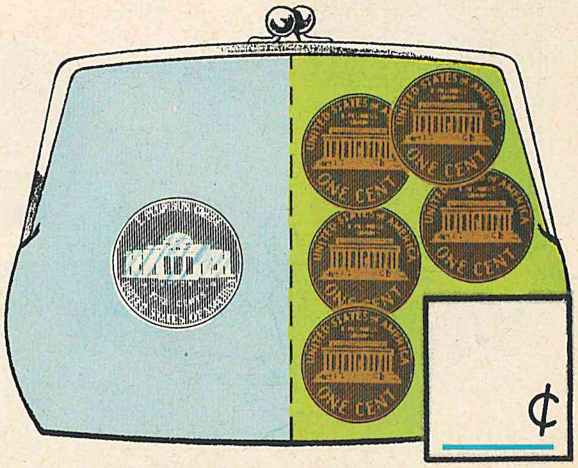
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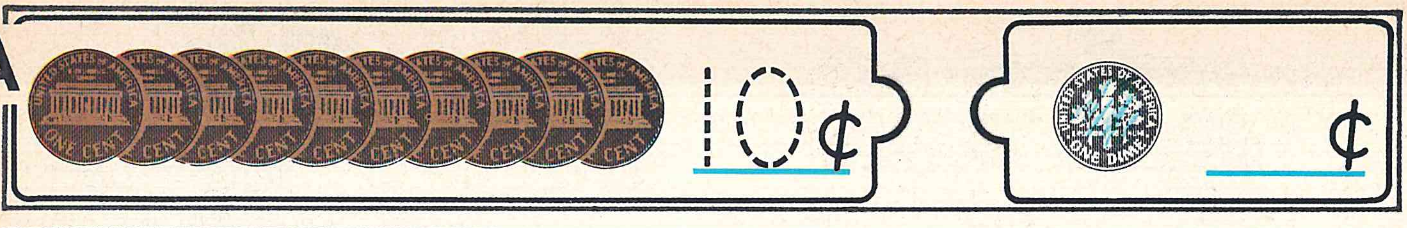

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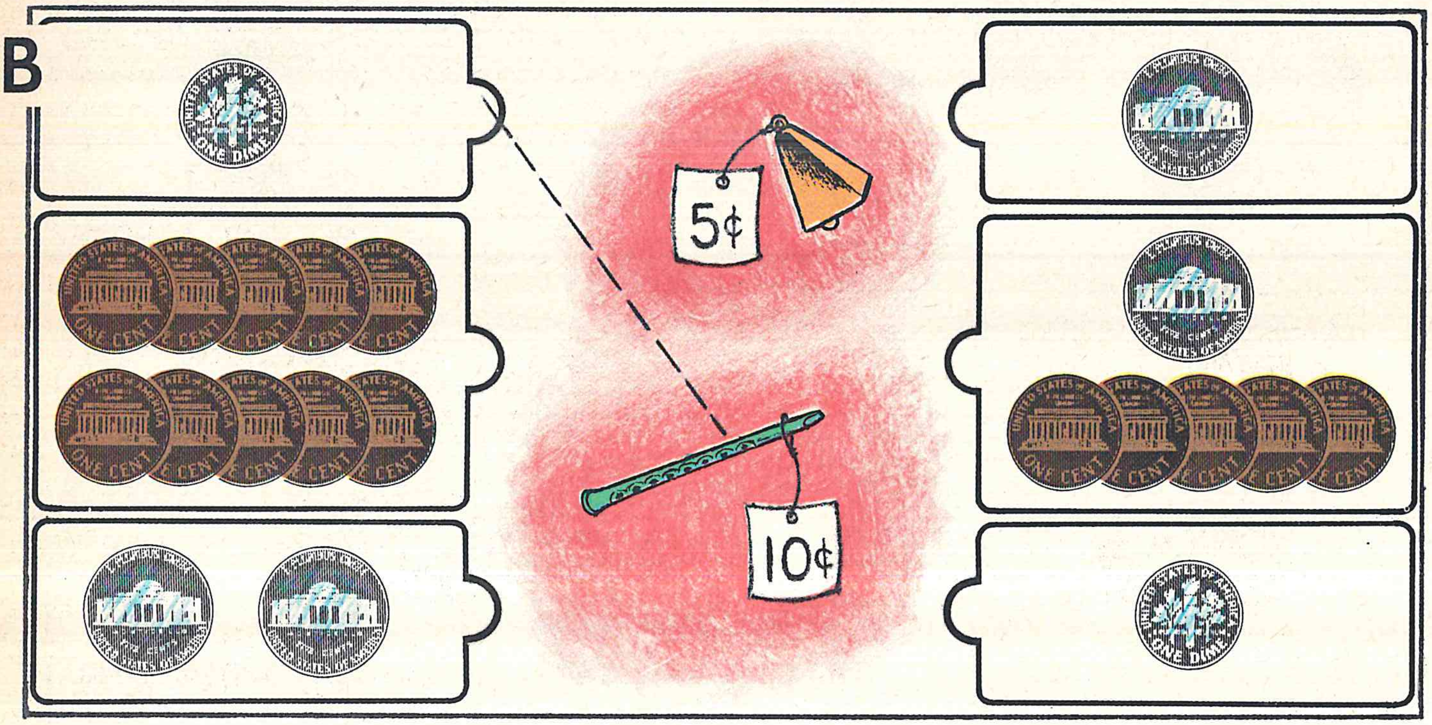

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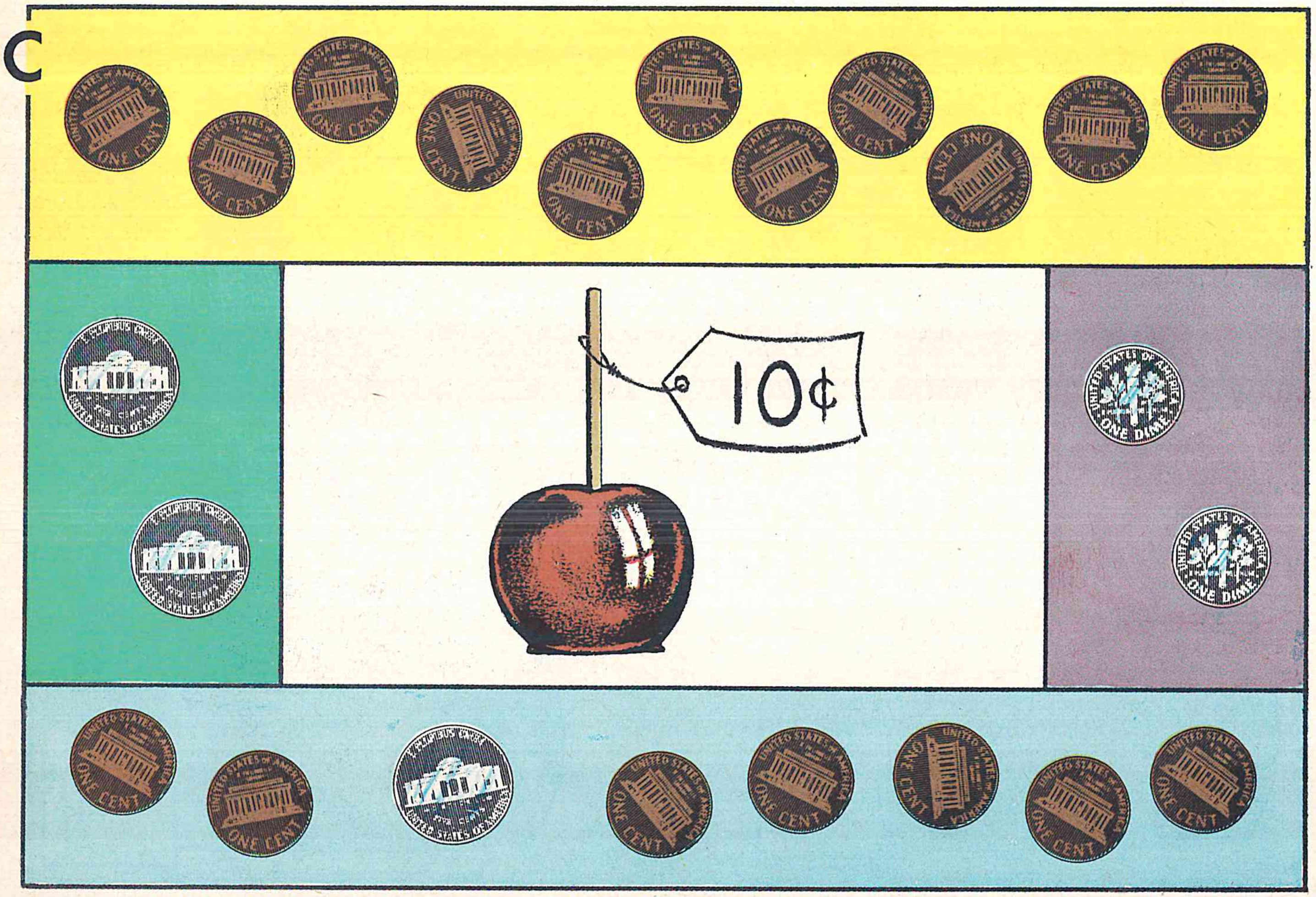

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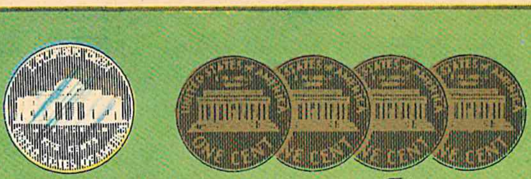
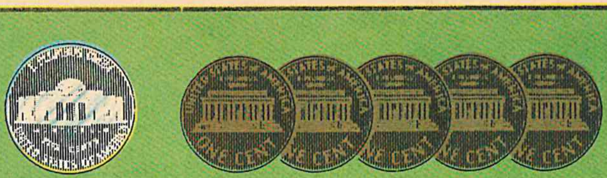


8¢ [✓ 9¢] 10¢



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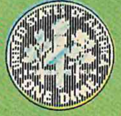

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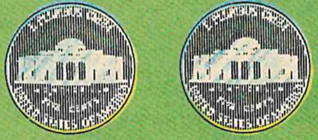

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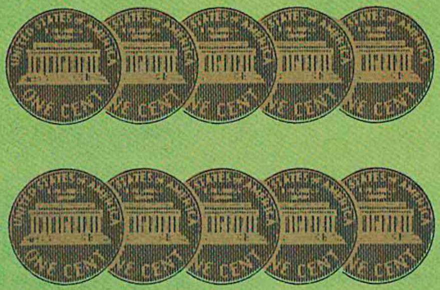

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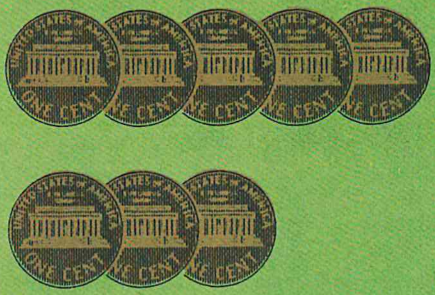

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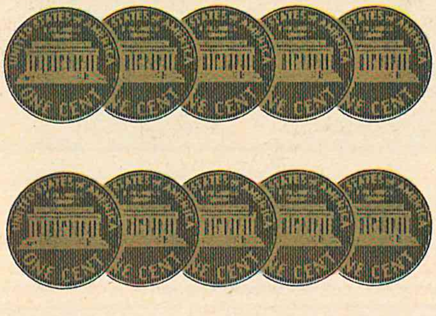

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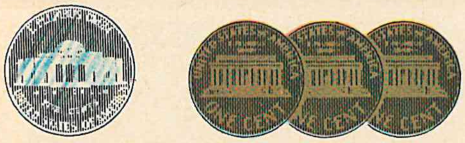

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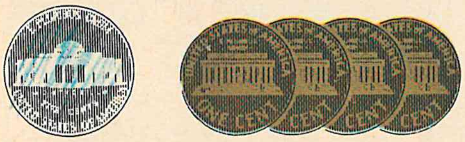

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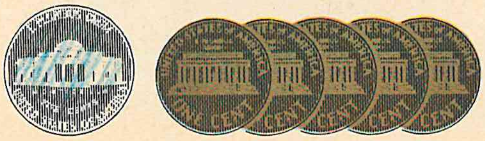

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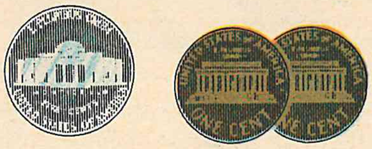

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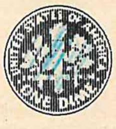

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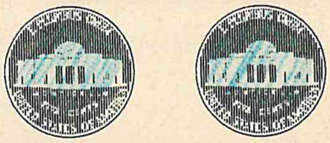

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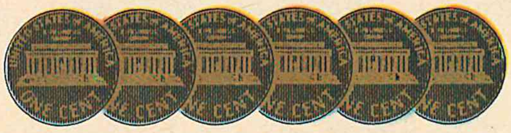

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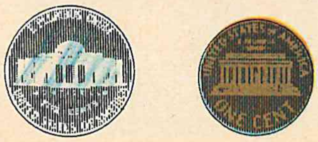

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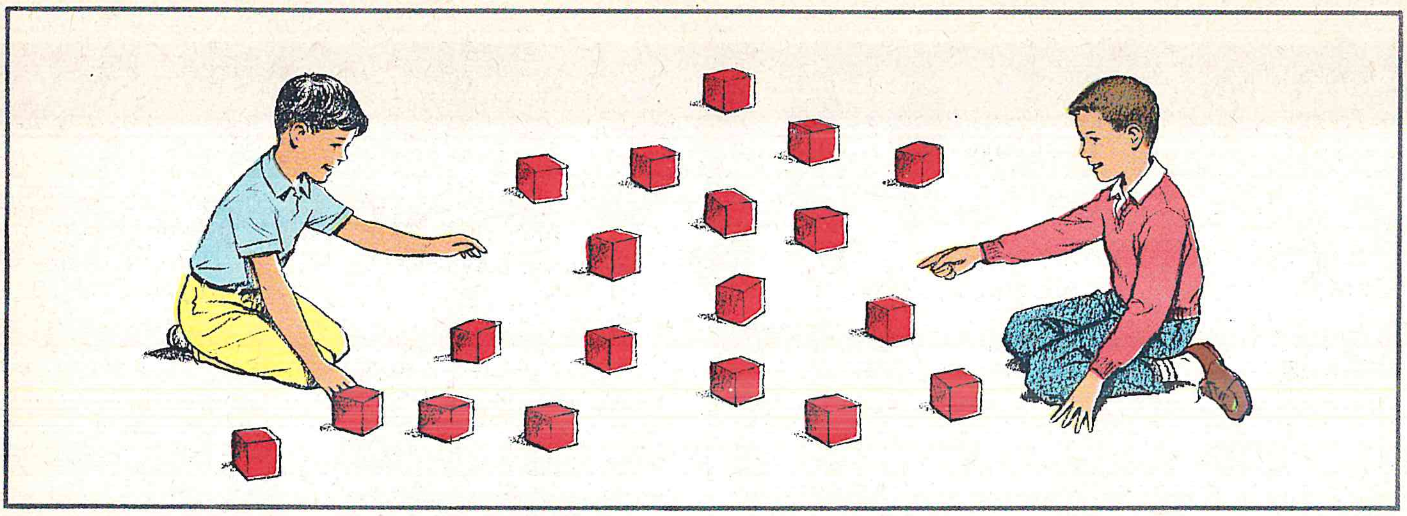

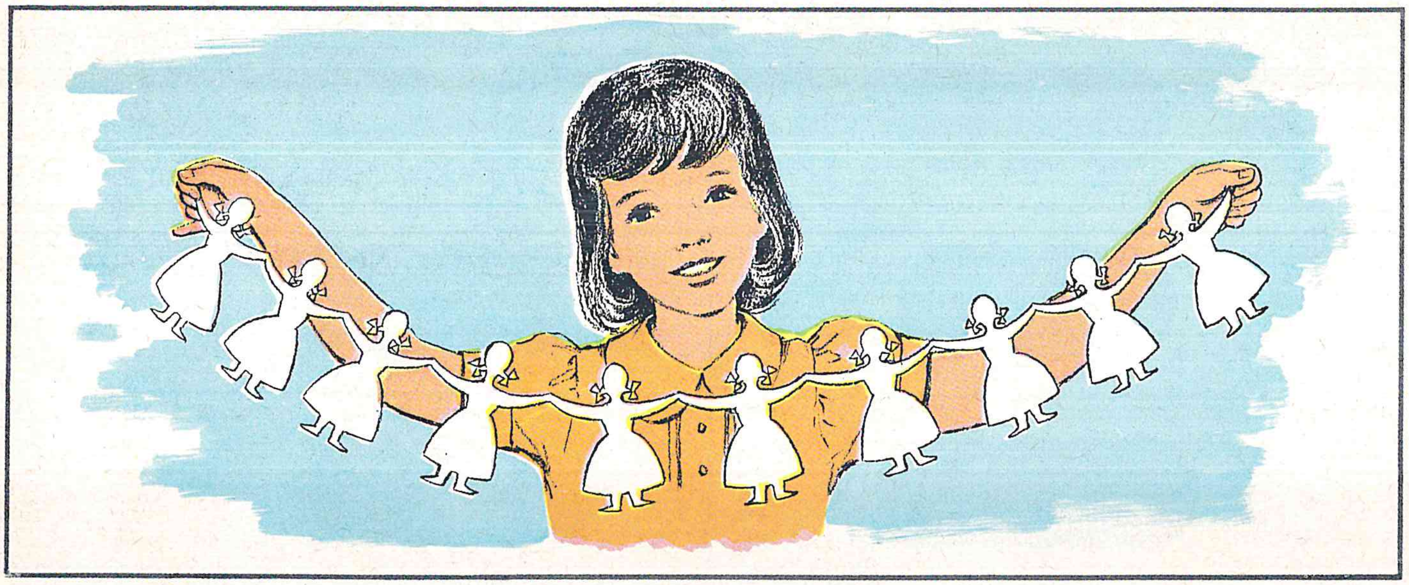

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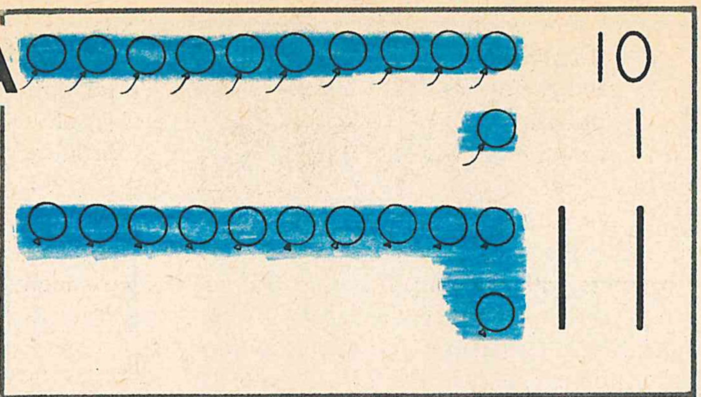
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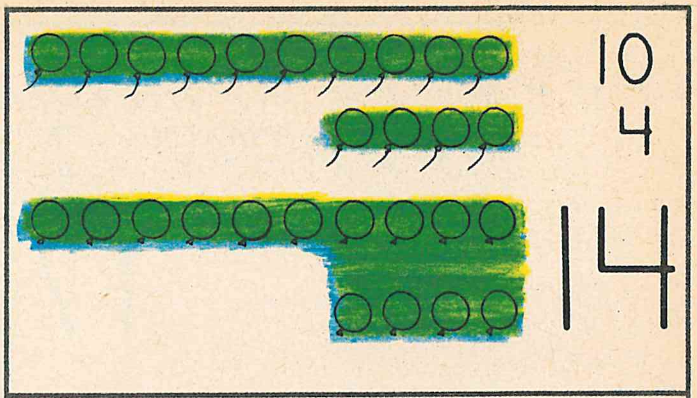
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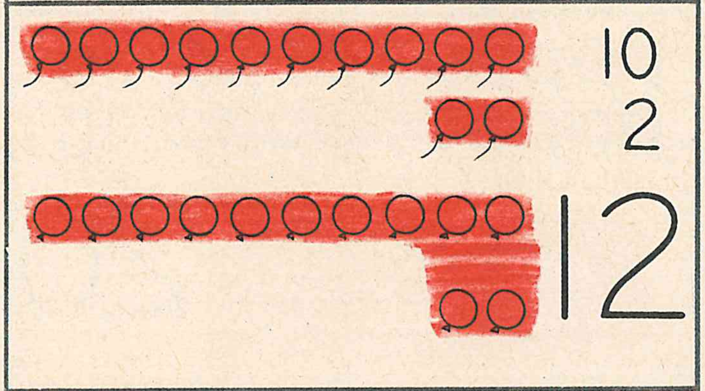
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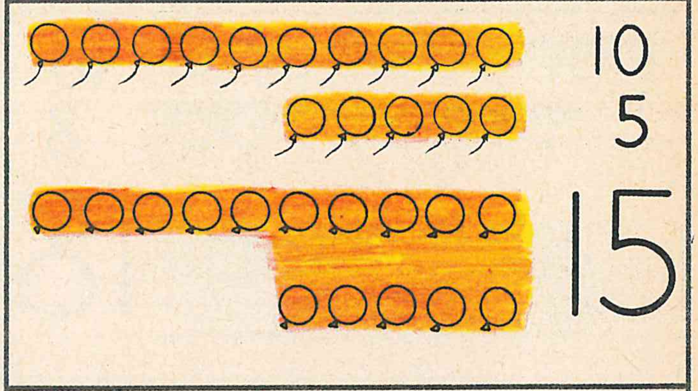
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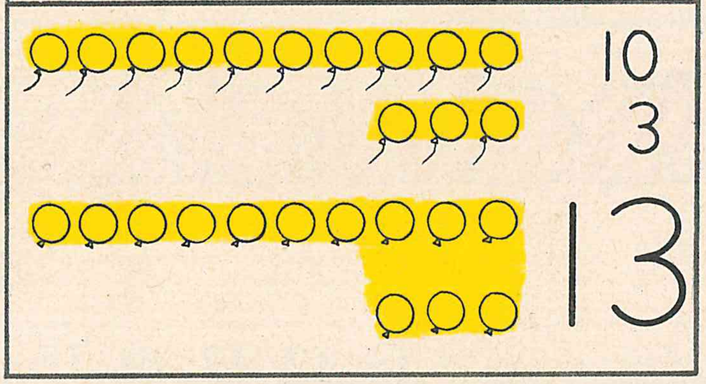
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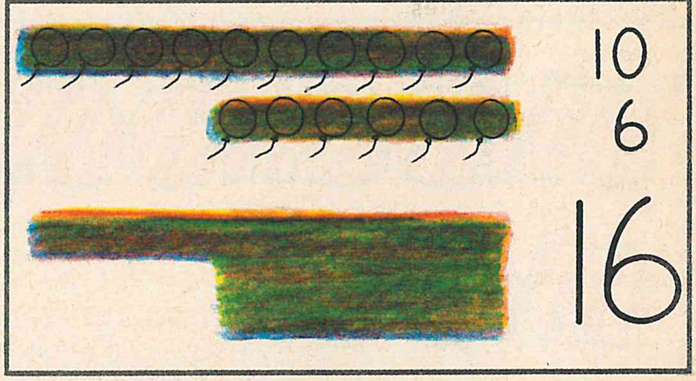
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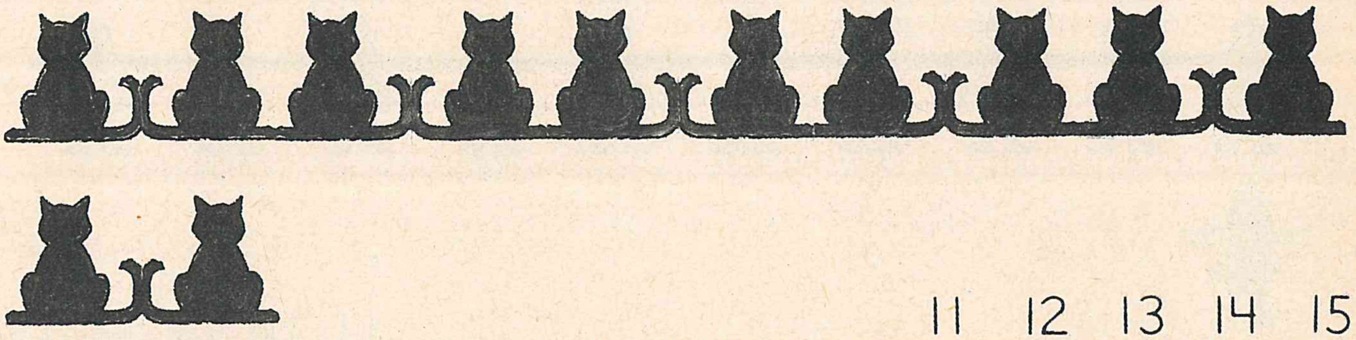
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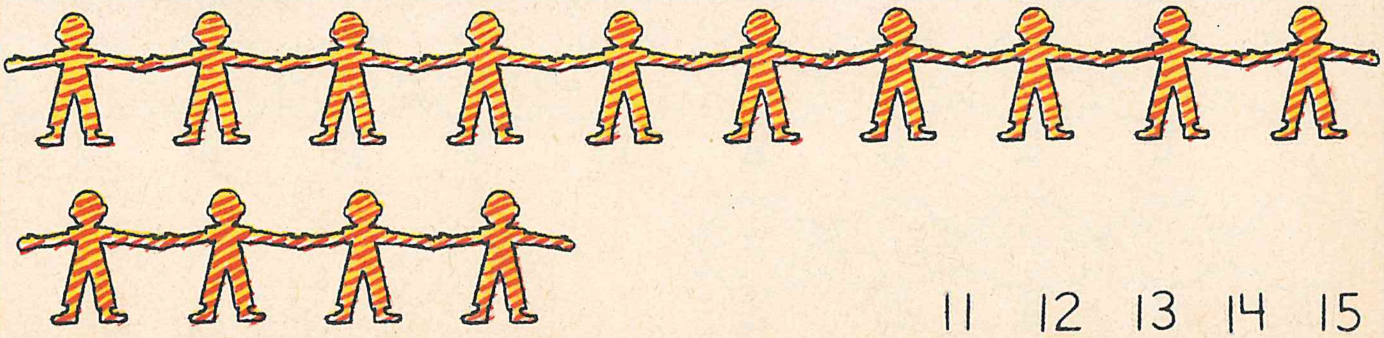
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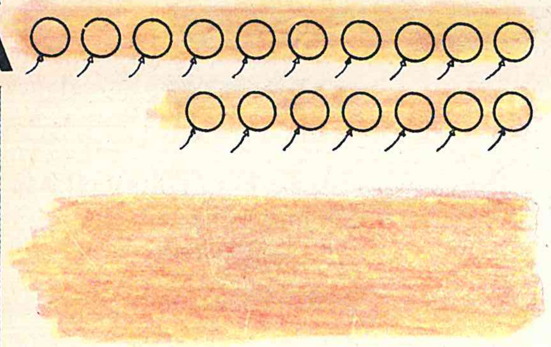

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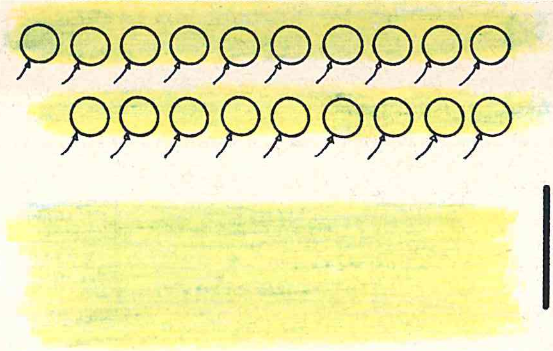

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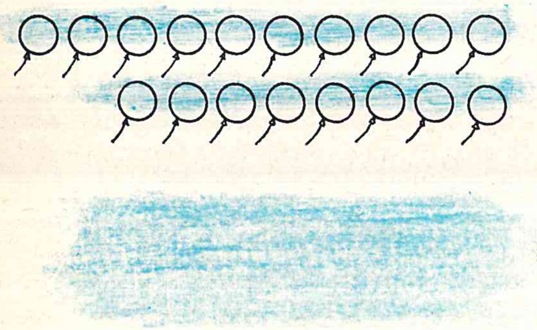

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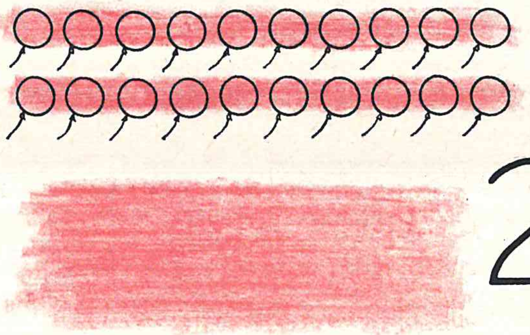

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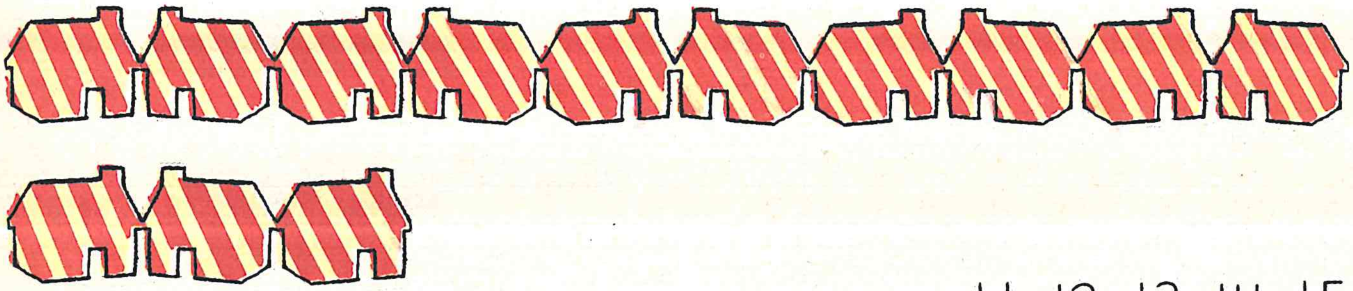

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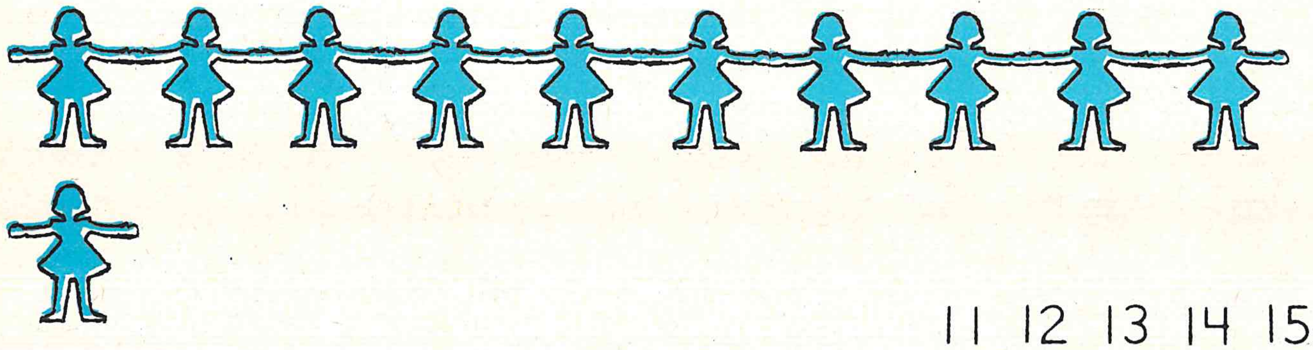

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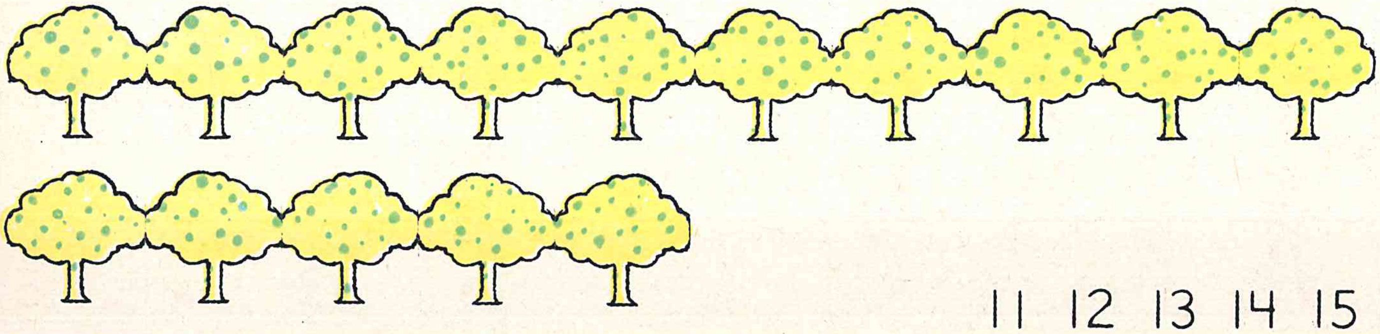

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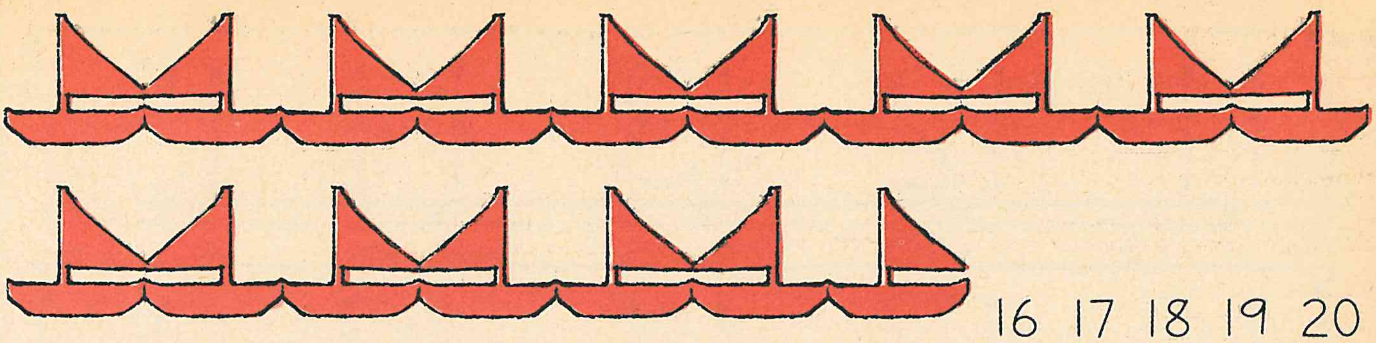

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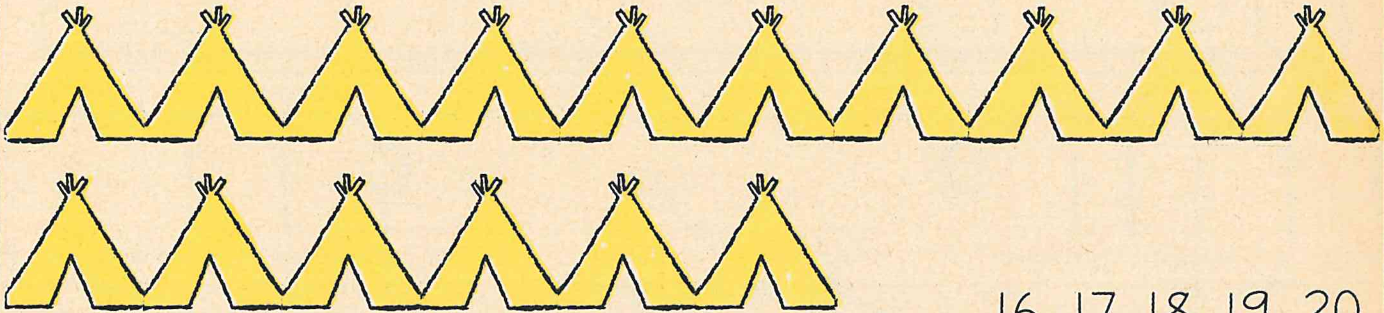

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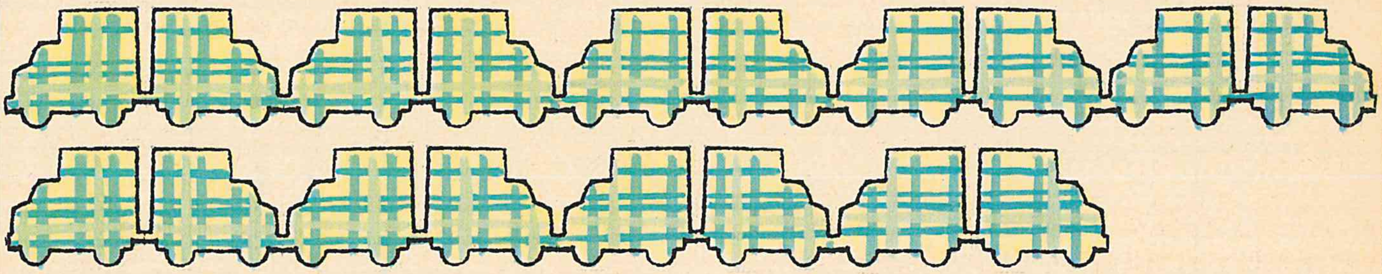

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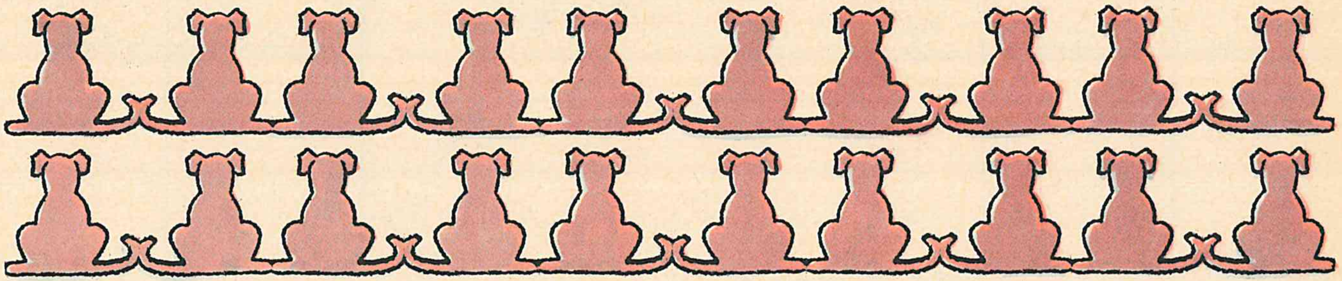

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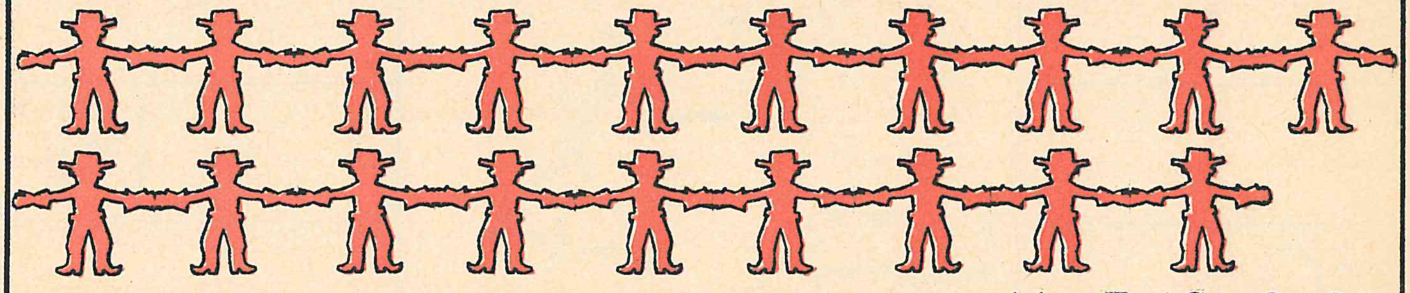

16 17 18 19 20

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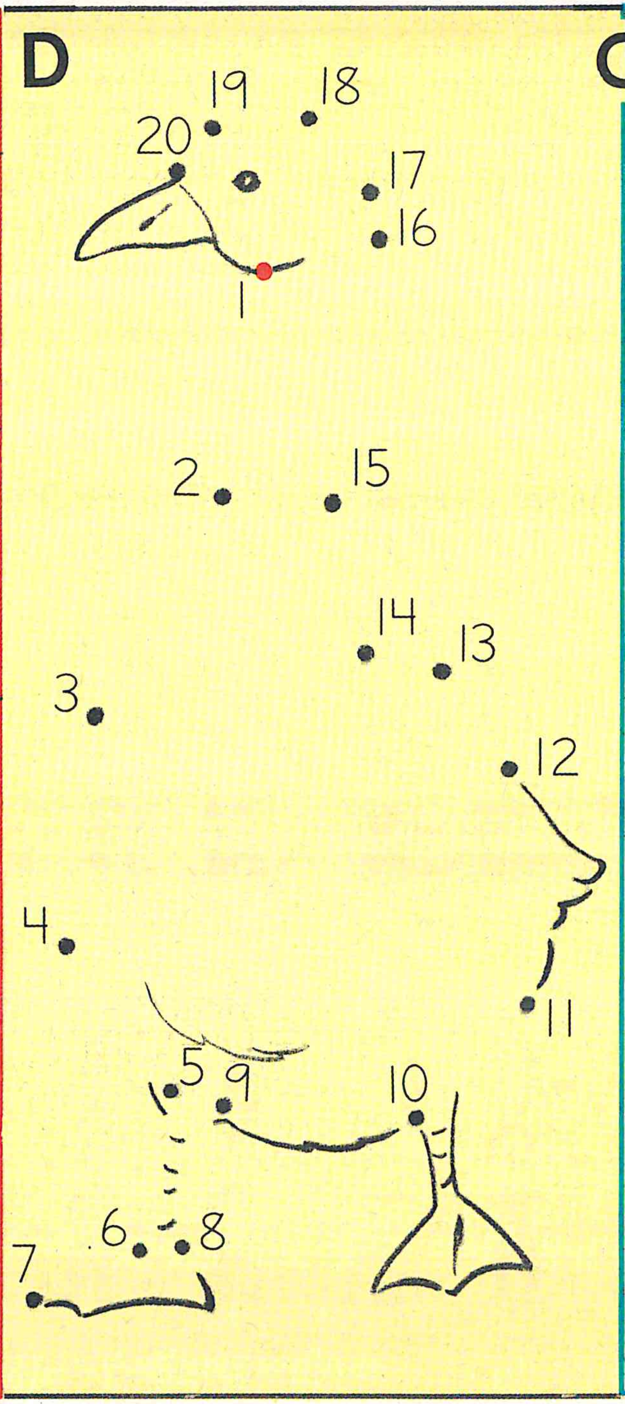

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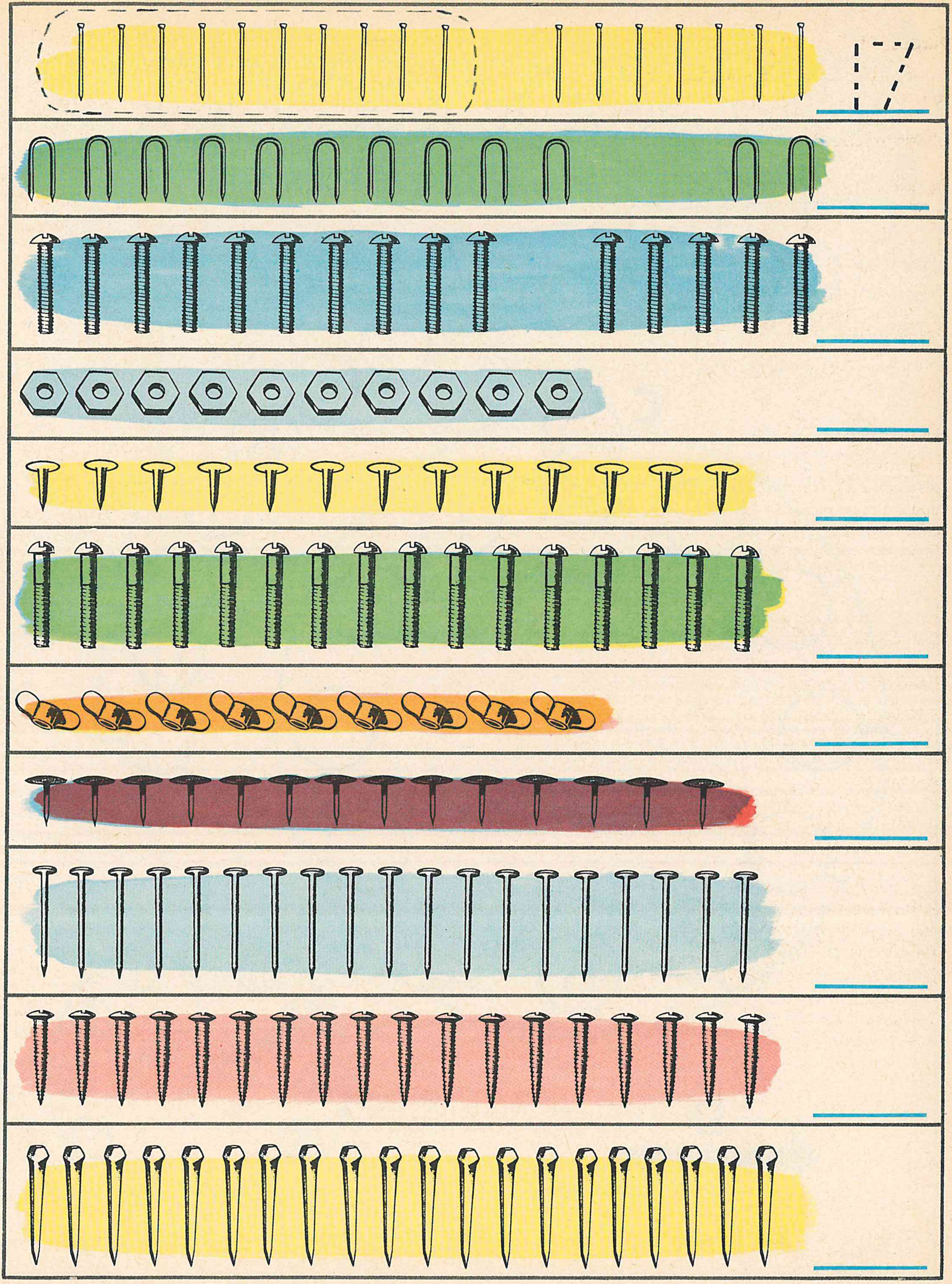
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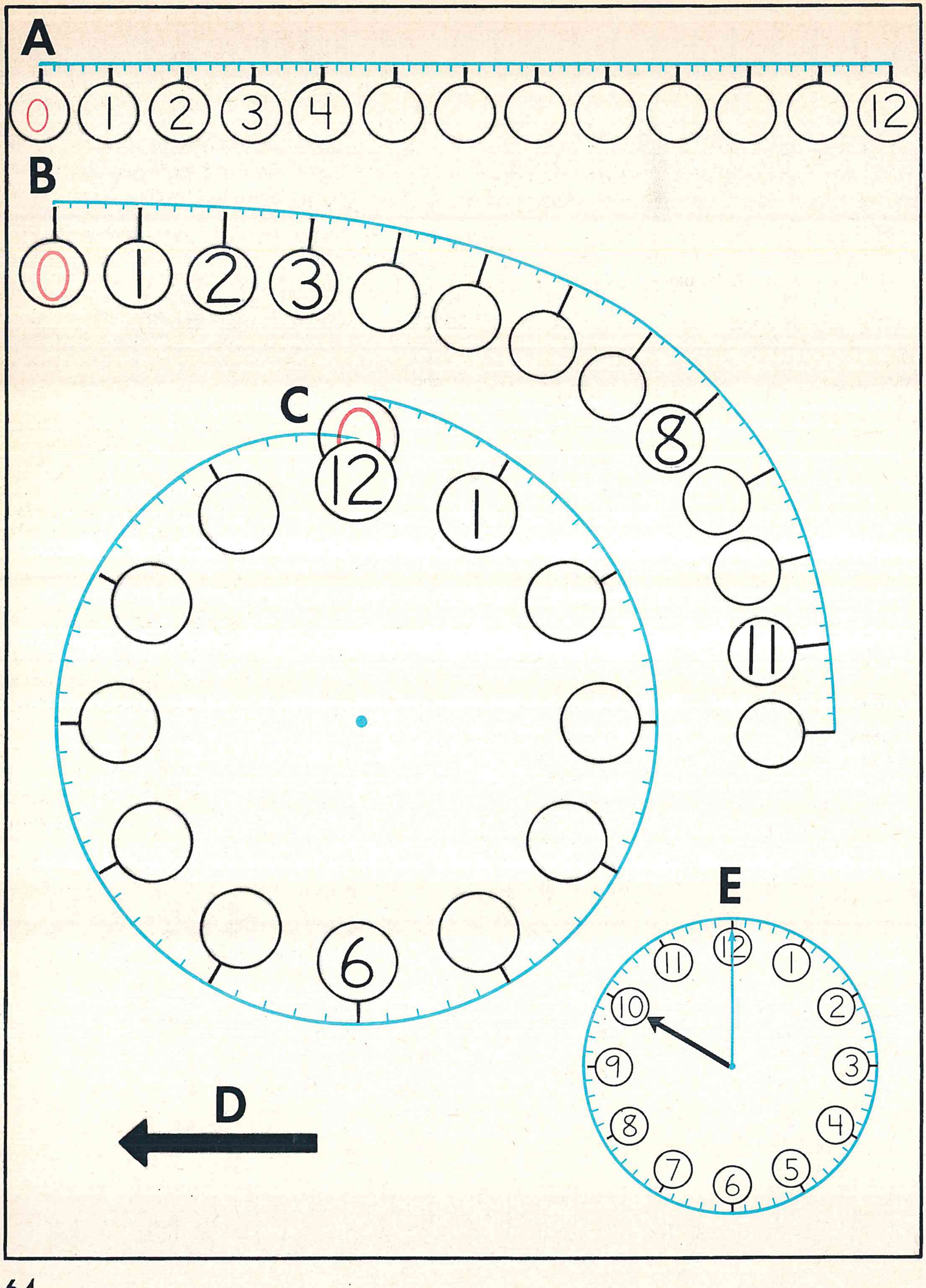
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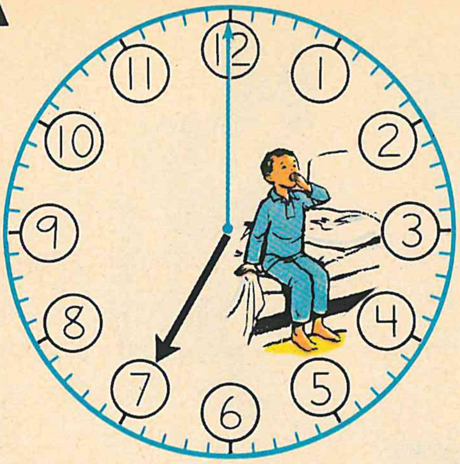
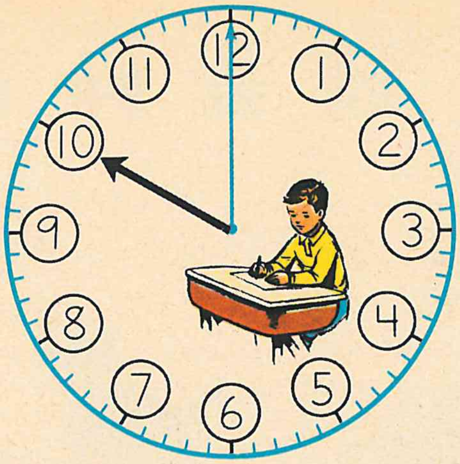
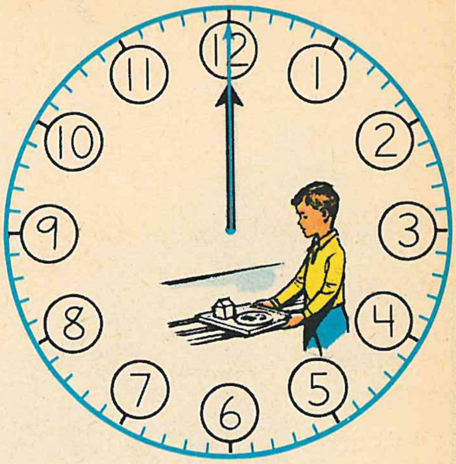
A





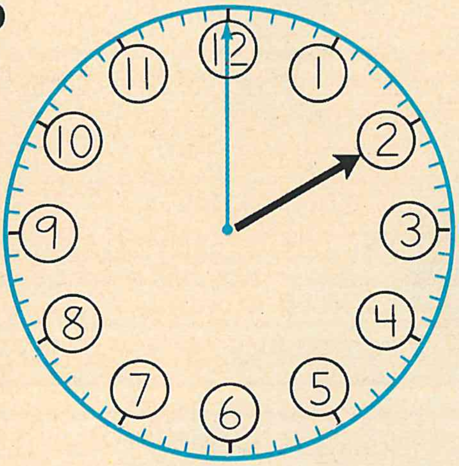


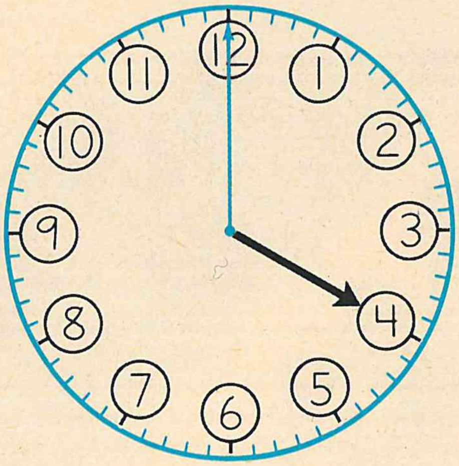
7 o'clock

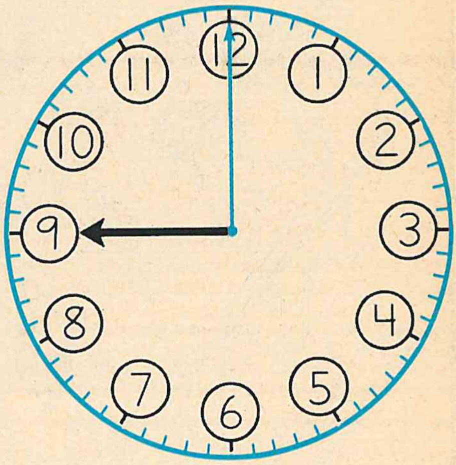
10 o'clock

12 o'clock

B







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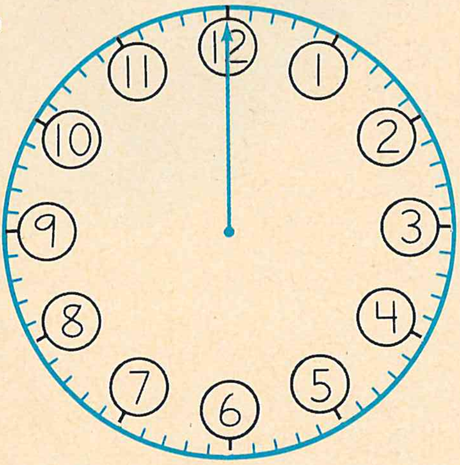
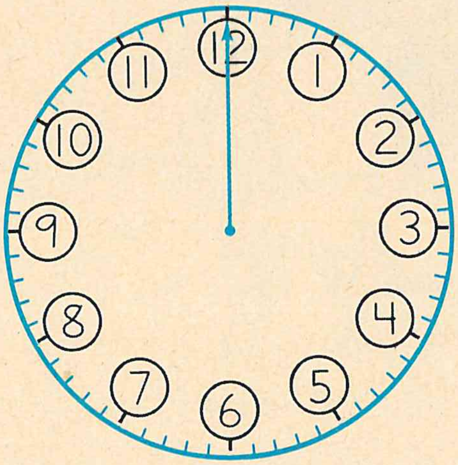
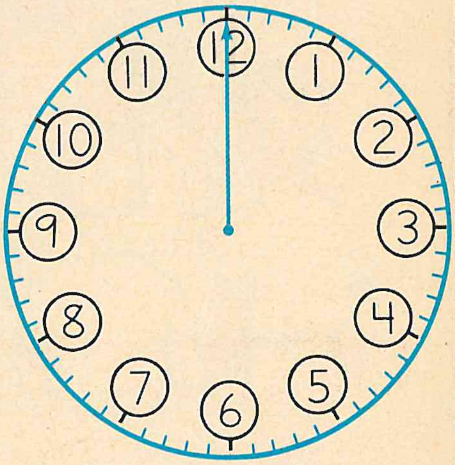
C



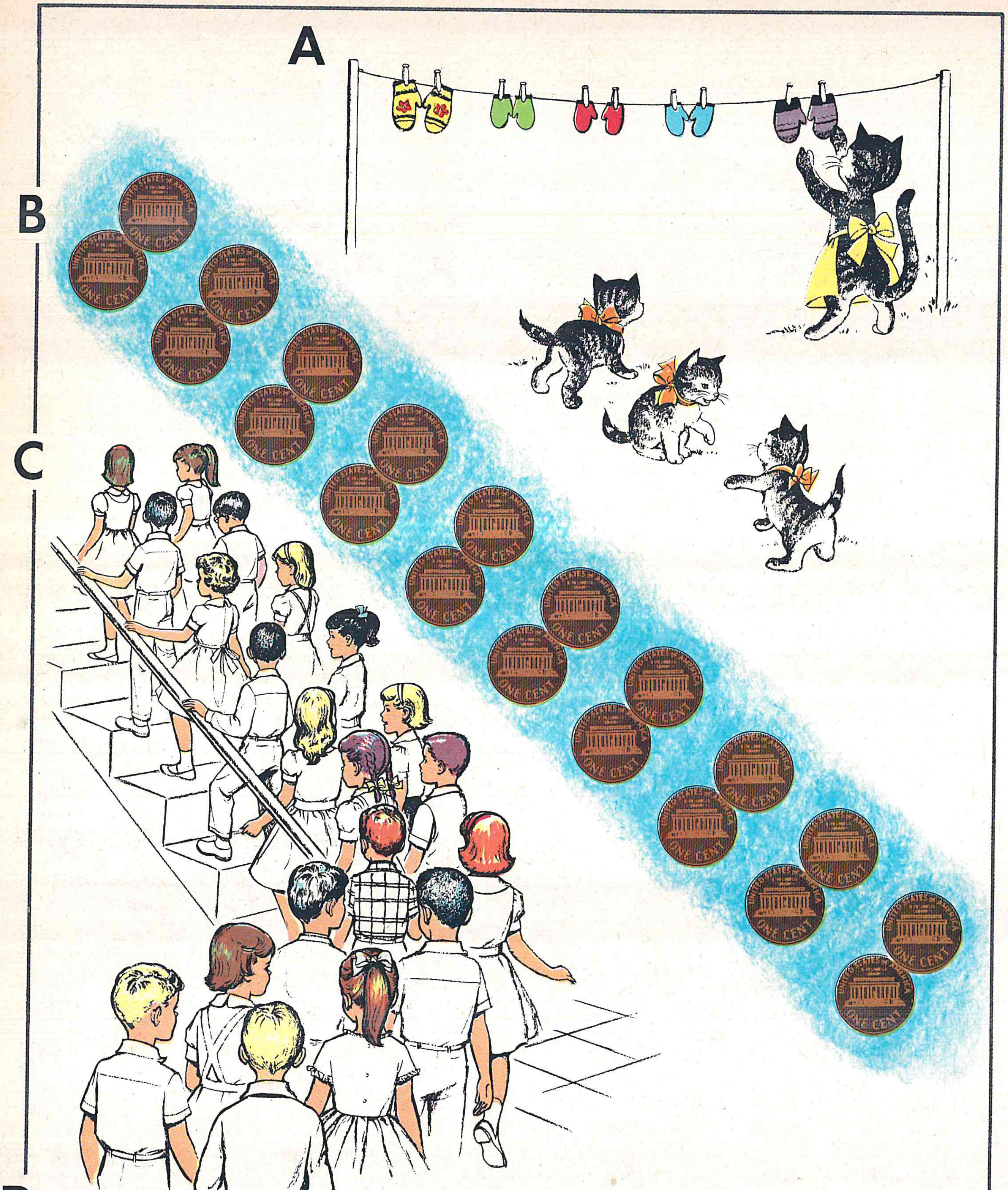




3 o'clock

8 o'clock

11 o'clock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B

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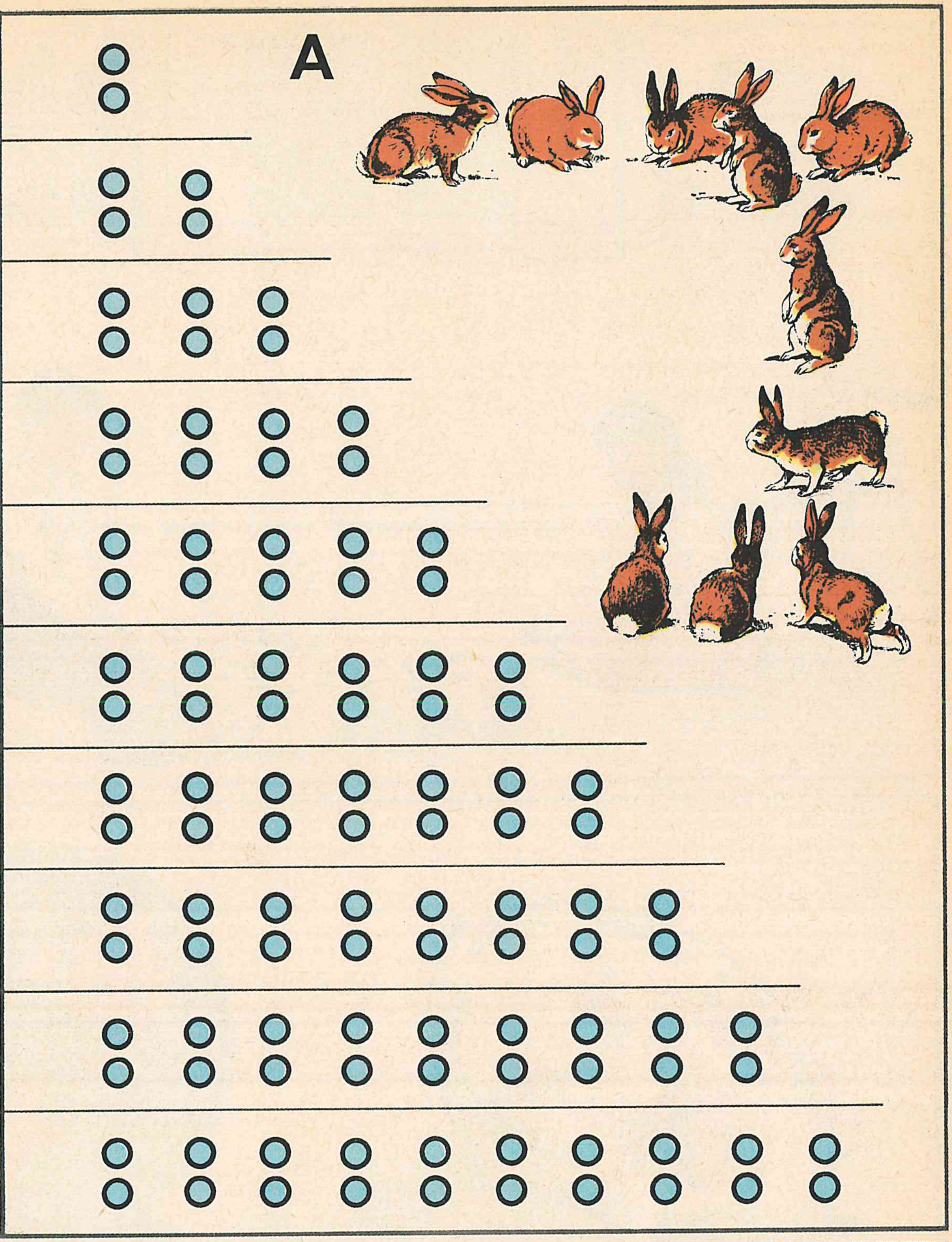
A



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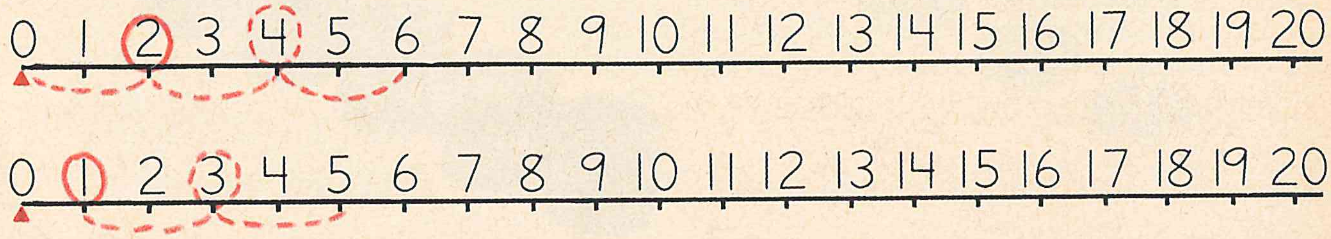
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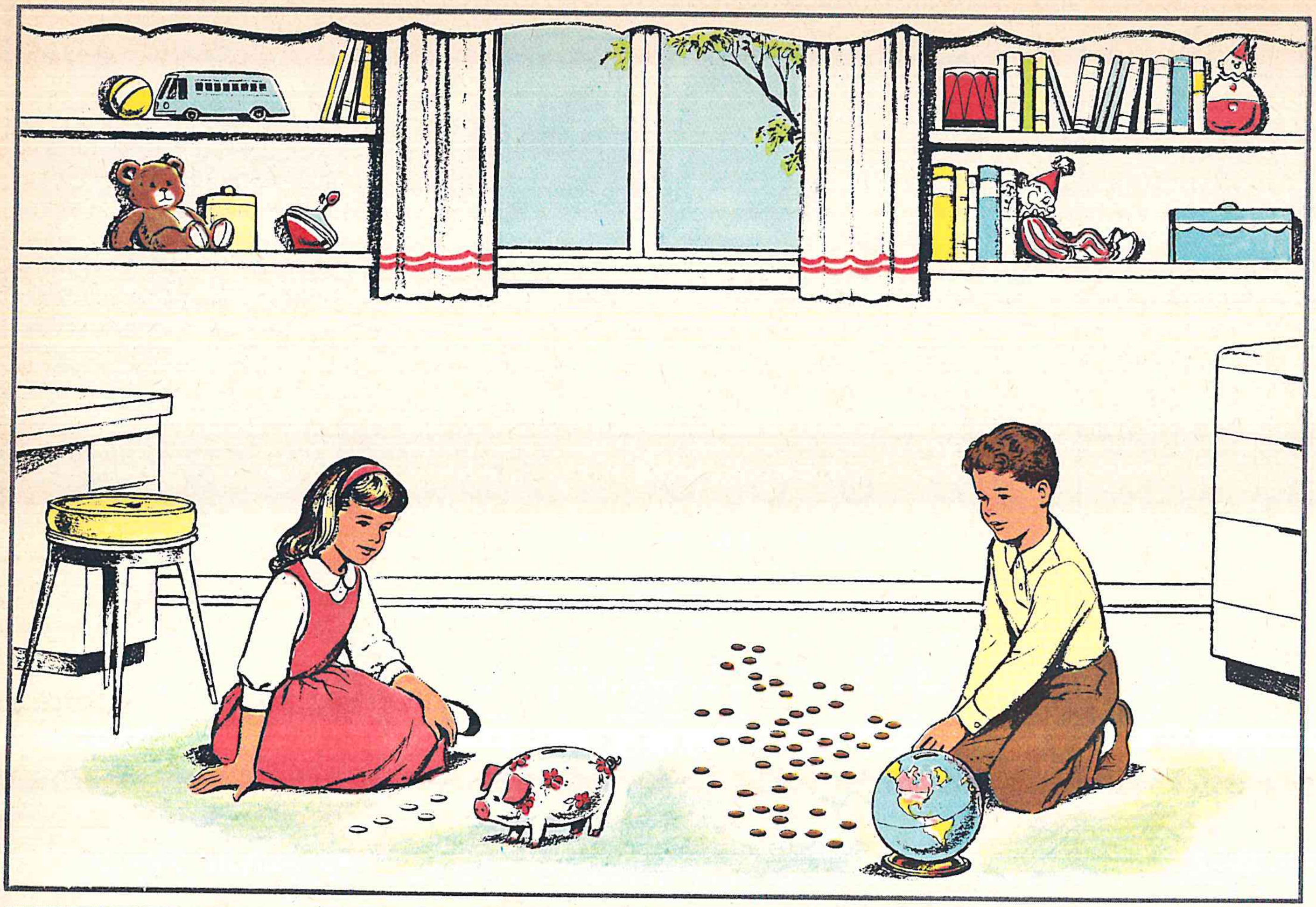

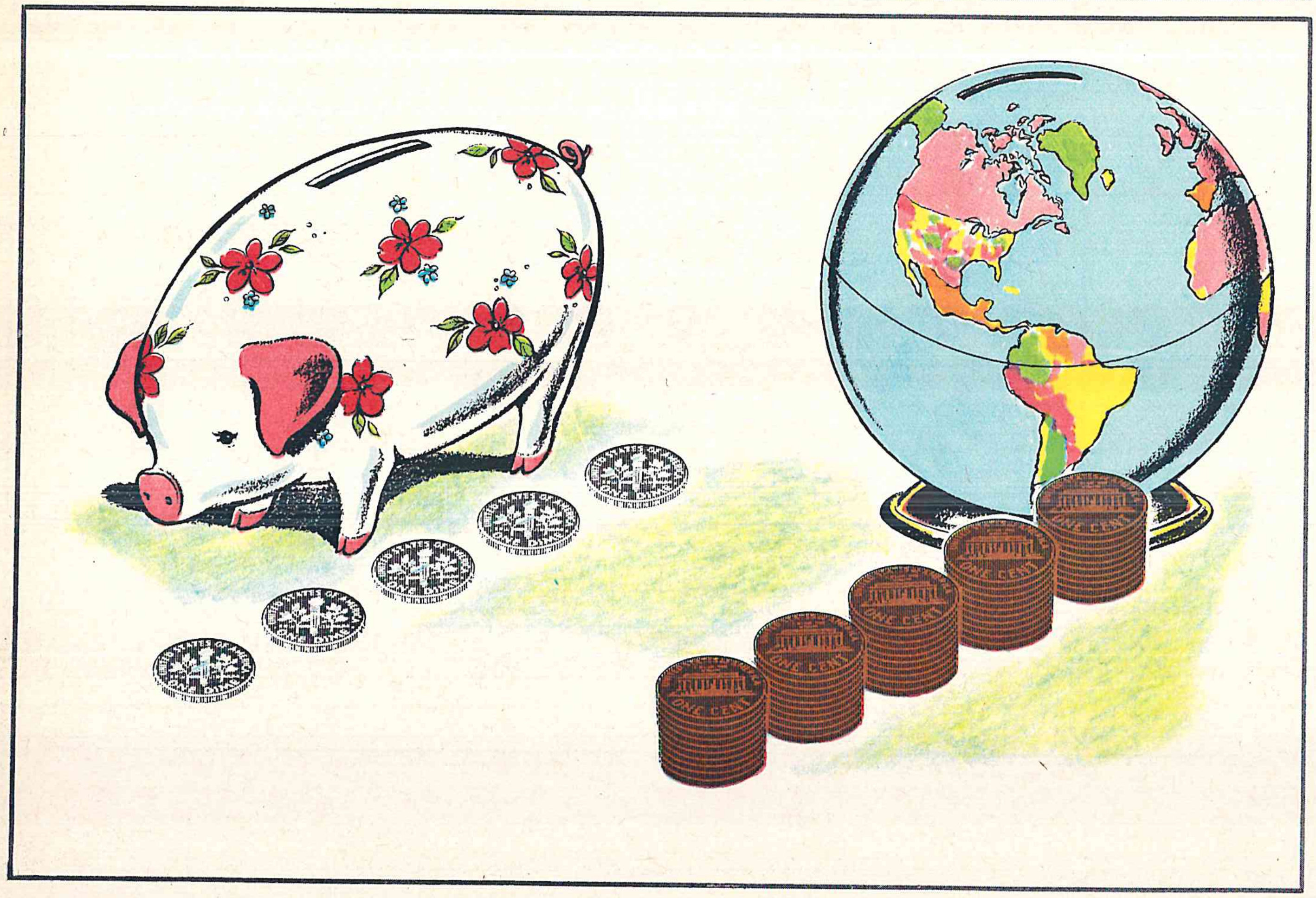
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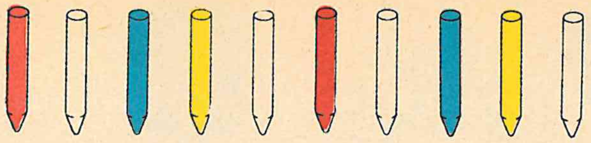

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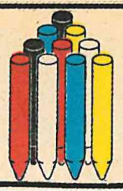

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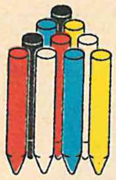

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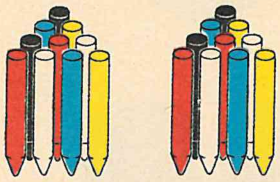

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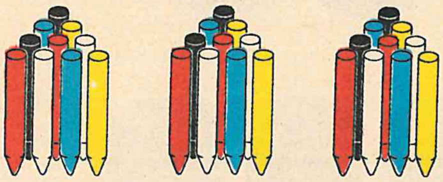

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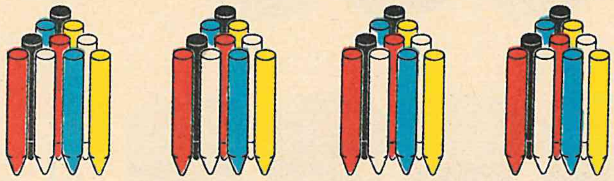

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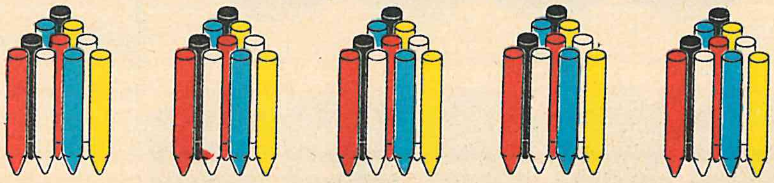

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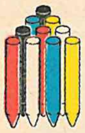

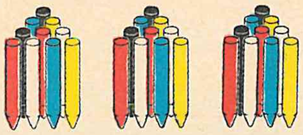

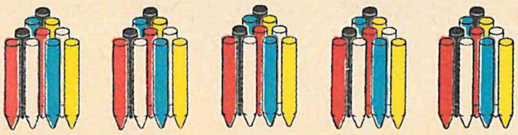

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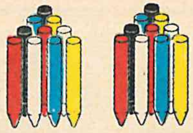

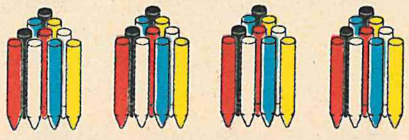

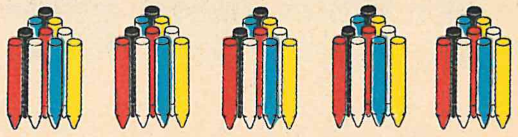

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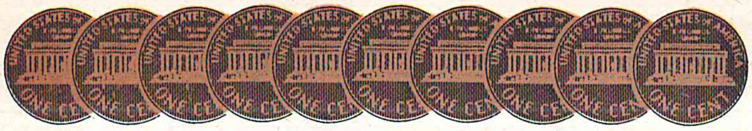

10 pennies

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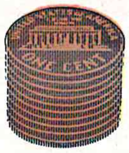
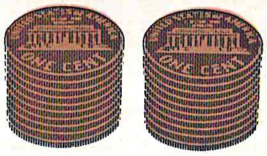
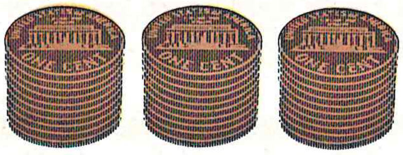
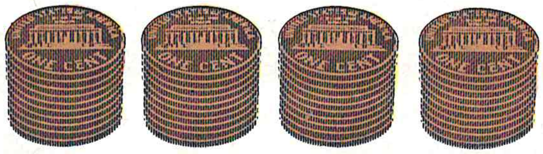
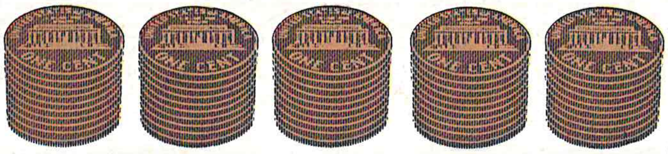
10 pennies		1 set of ten
____ pennies		____ sets of ten
____ pennies		____ sets of ten
____ pennies		____ sets of ten
____ pennies		____ sets of ten

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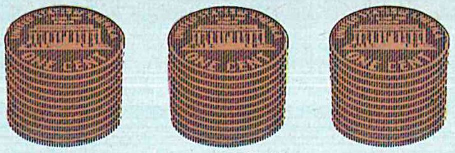
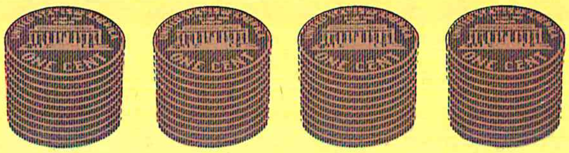
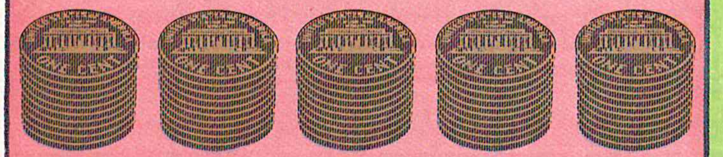


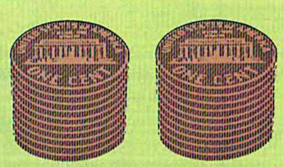
10¢ 20¢ [✓ 30¢] 40¢ 50¢



10¢ 20¢ 30¢ 40¢ 50¢



10¢ 20¢ 30¢ 40¢ 50¢



10¢ 20¢ 30¢ 40¢ 50¢

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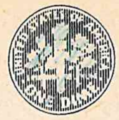

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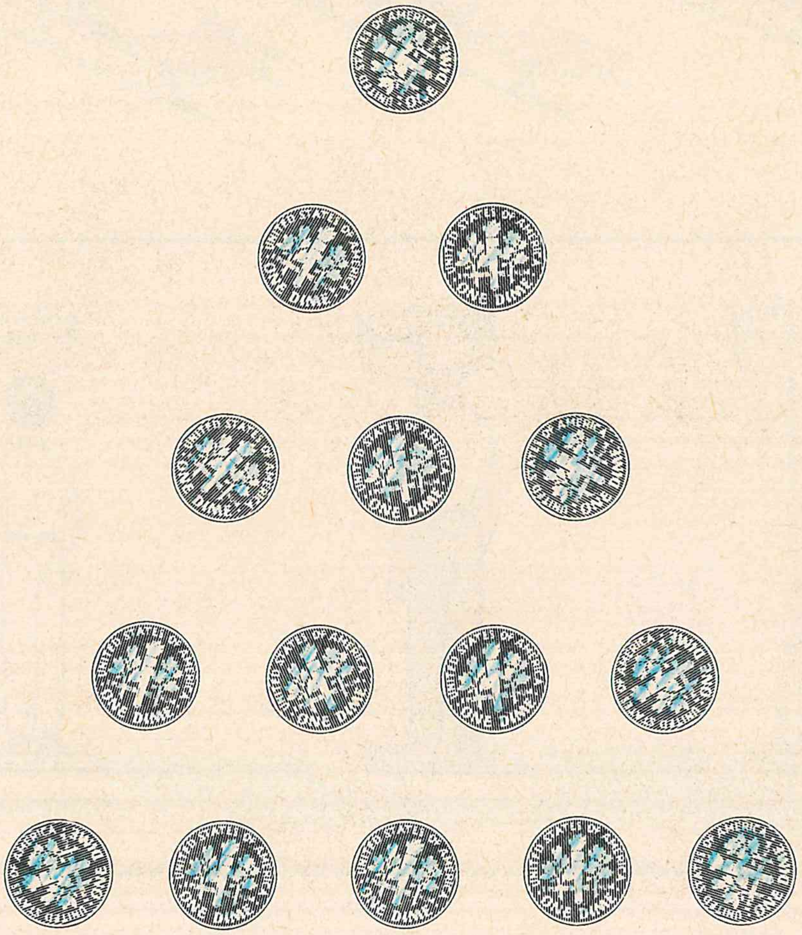

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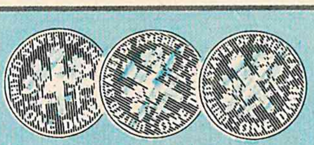
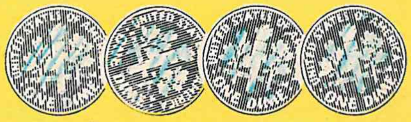


10¢ 20¢ 30¢ 40¢ 50¢



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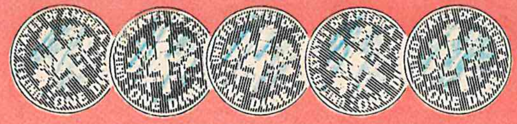

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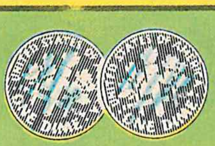

10¢ 20¢ 30¢ 40¢ 50¢

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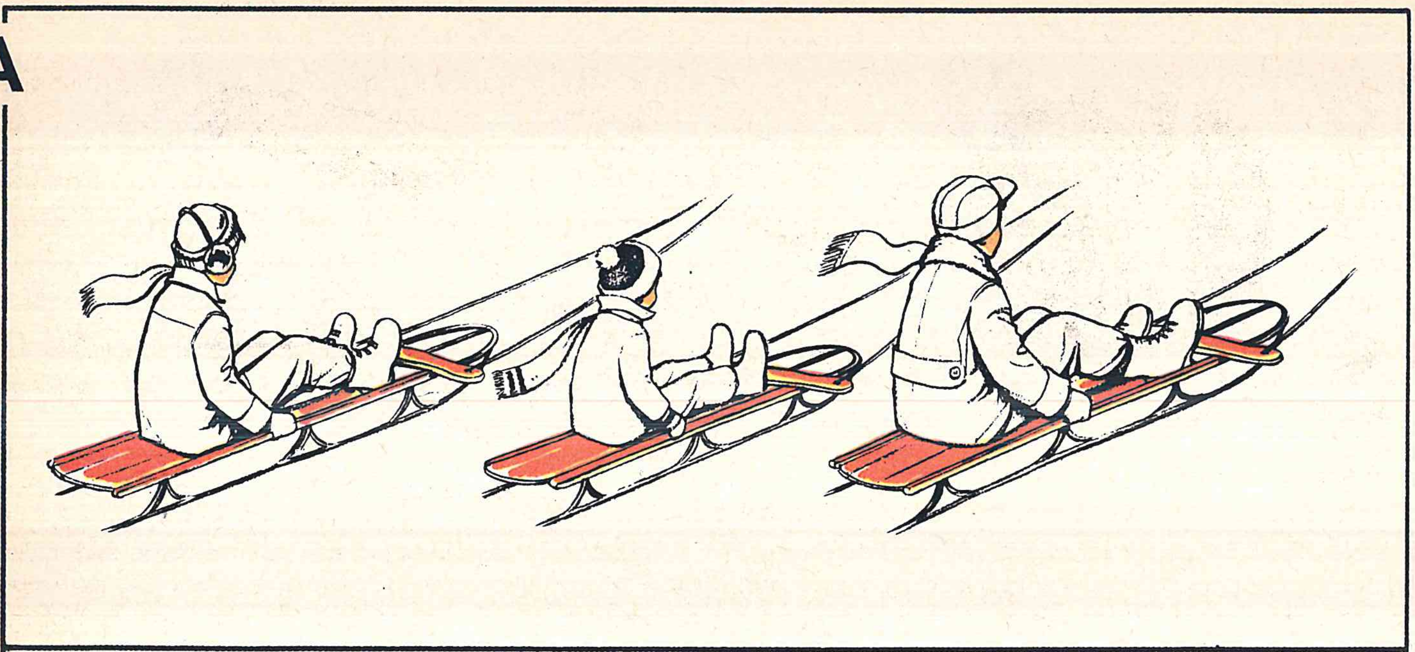

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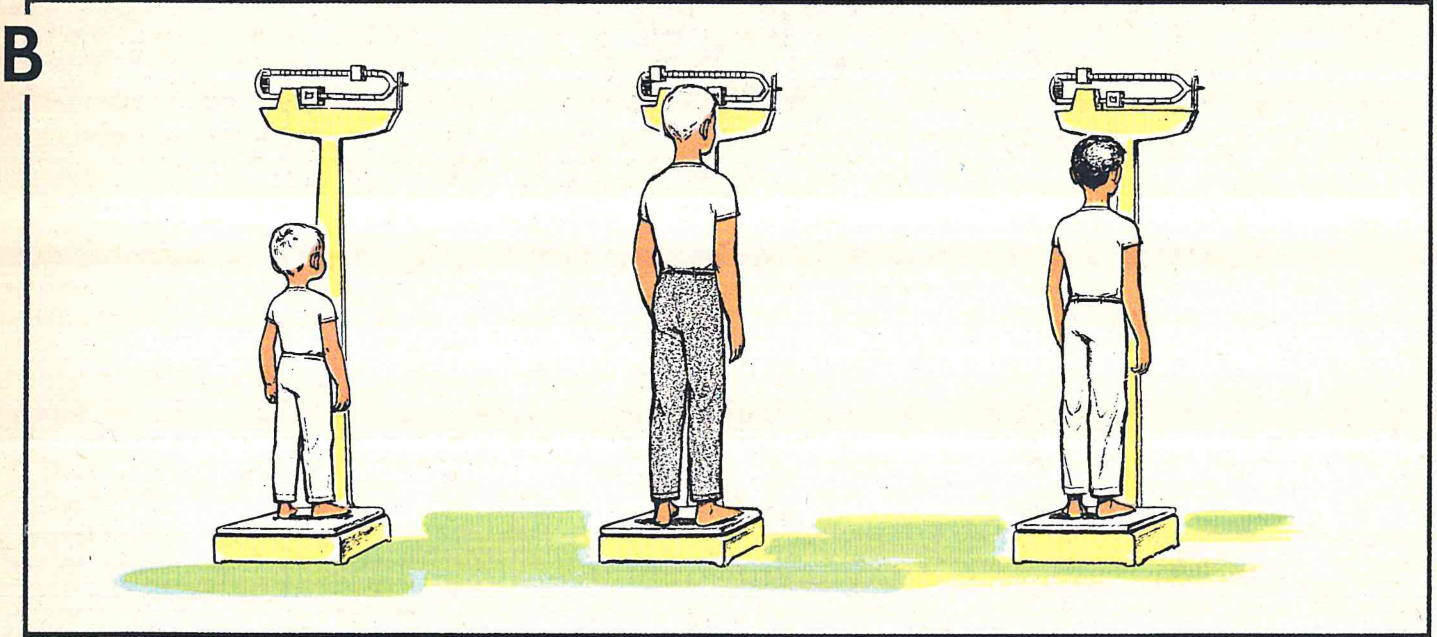

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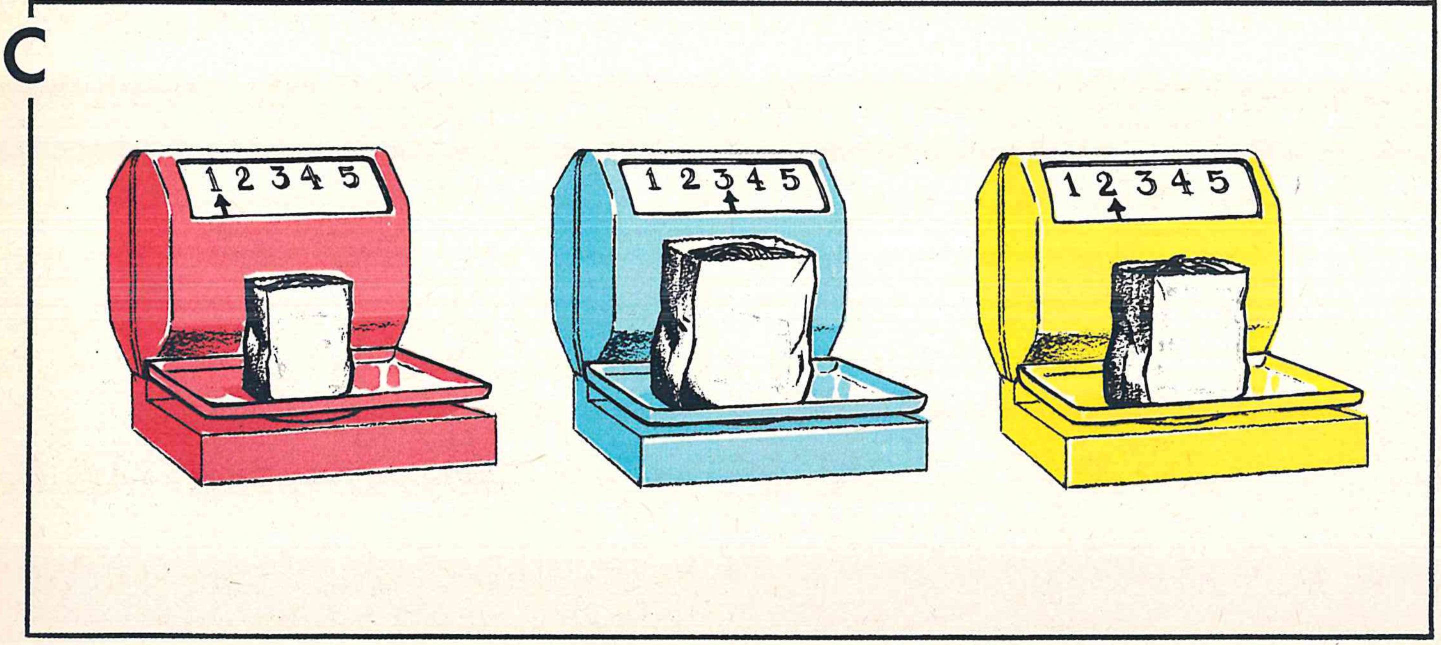

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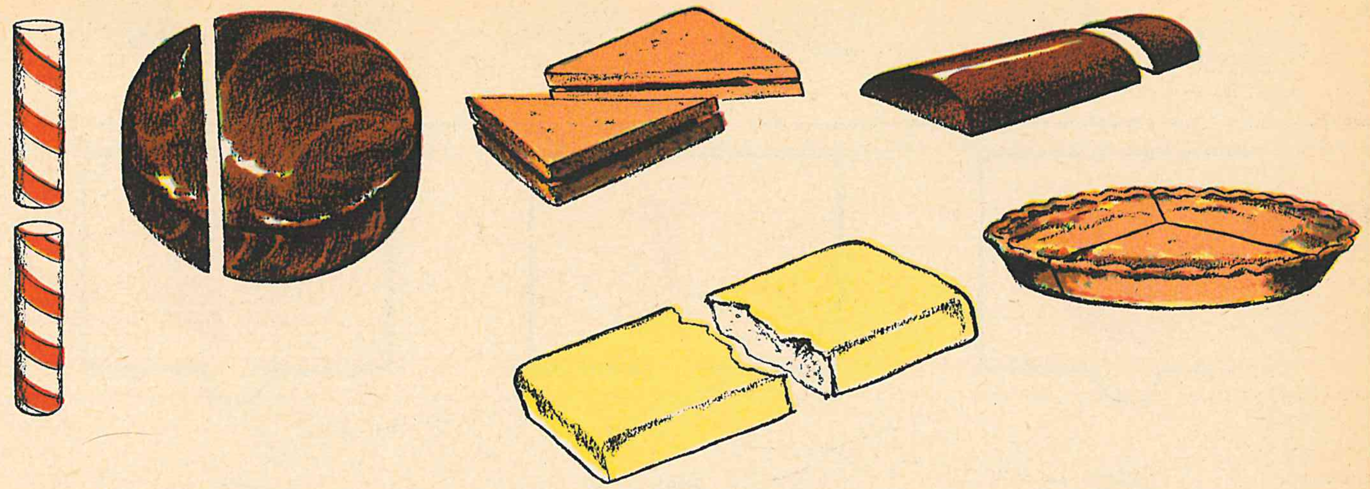

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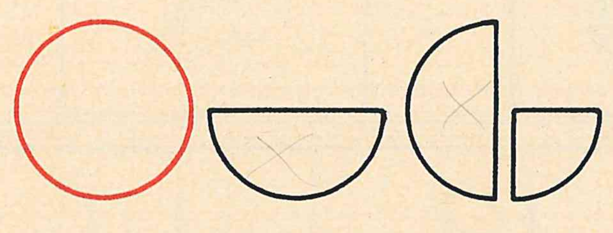

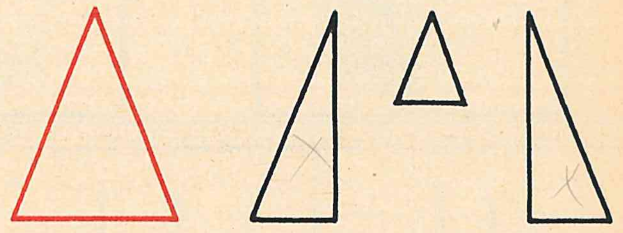

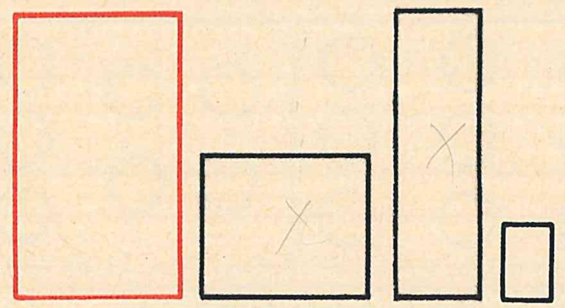

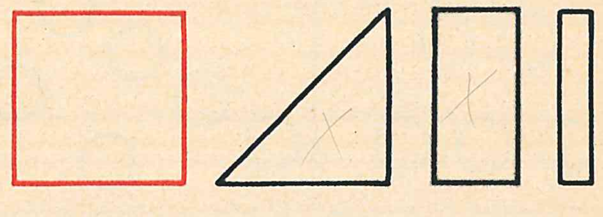

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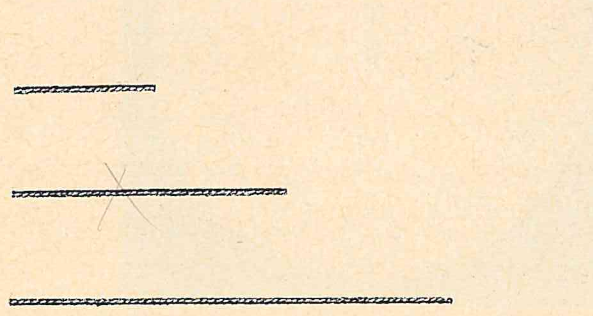

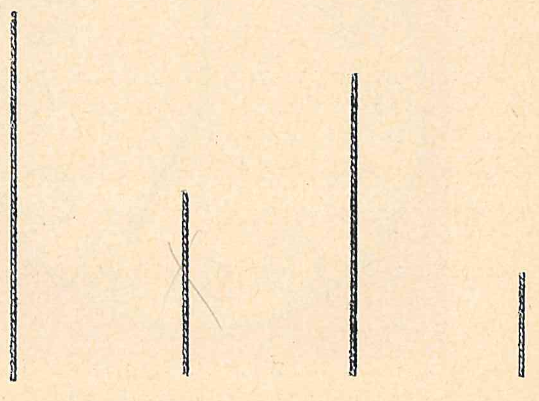

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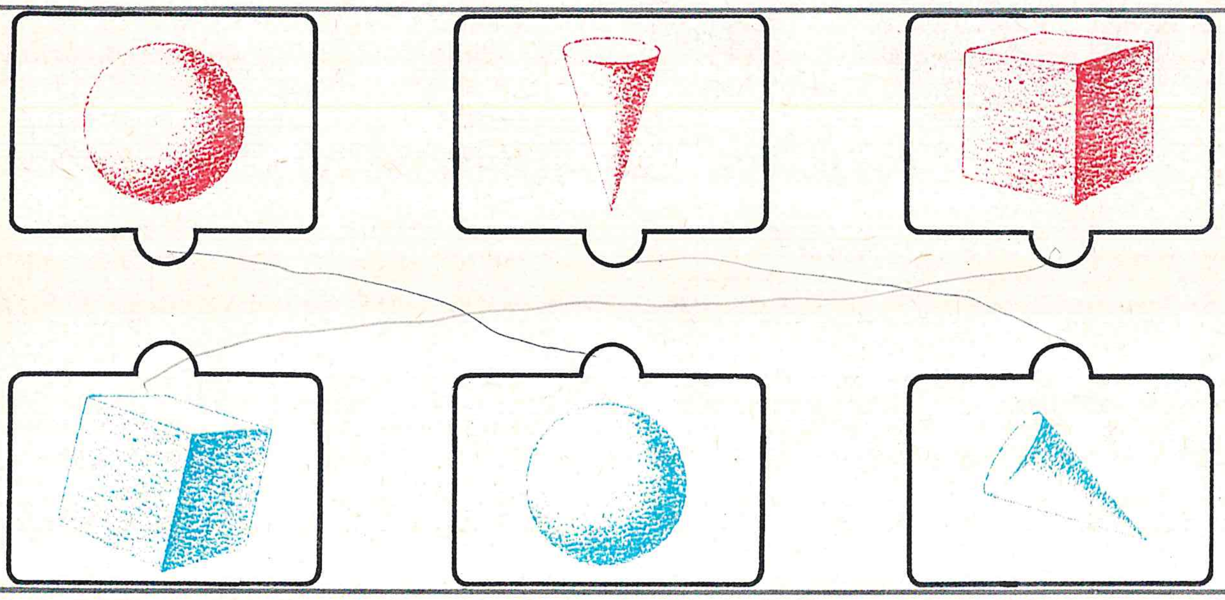

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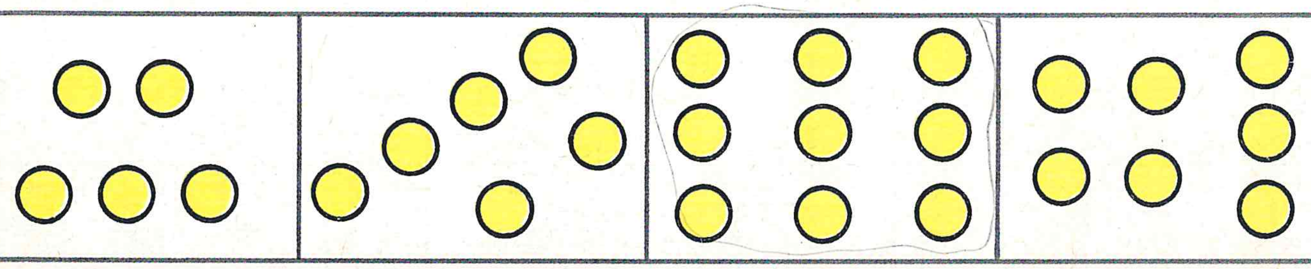

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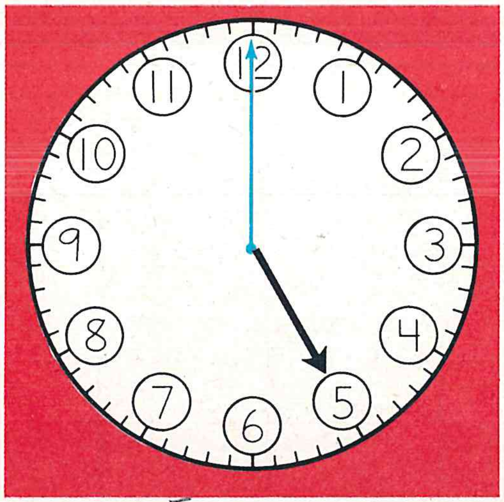

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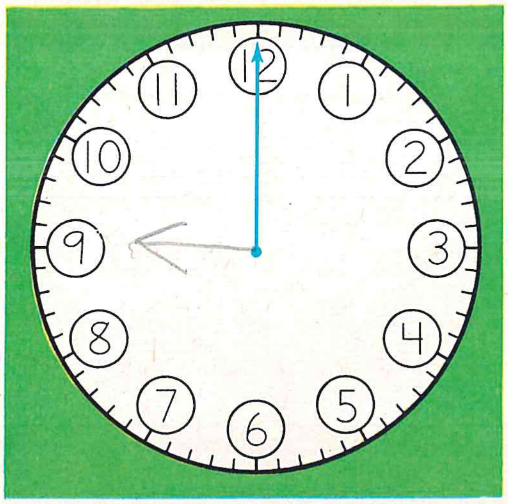

9 o'clock

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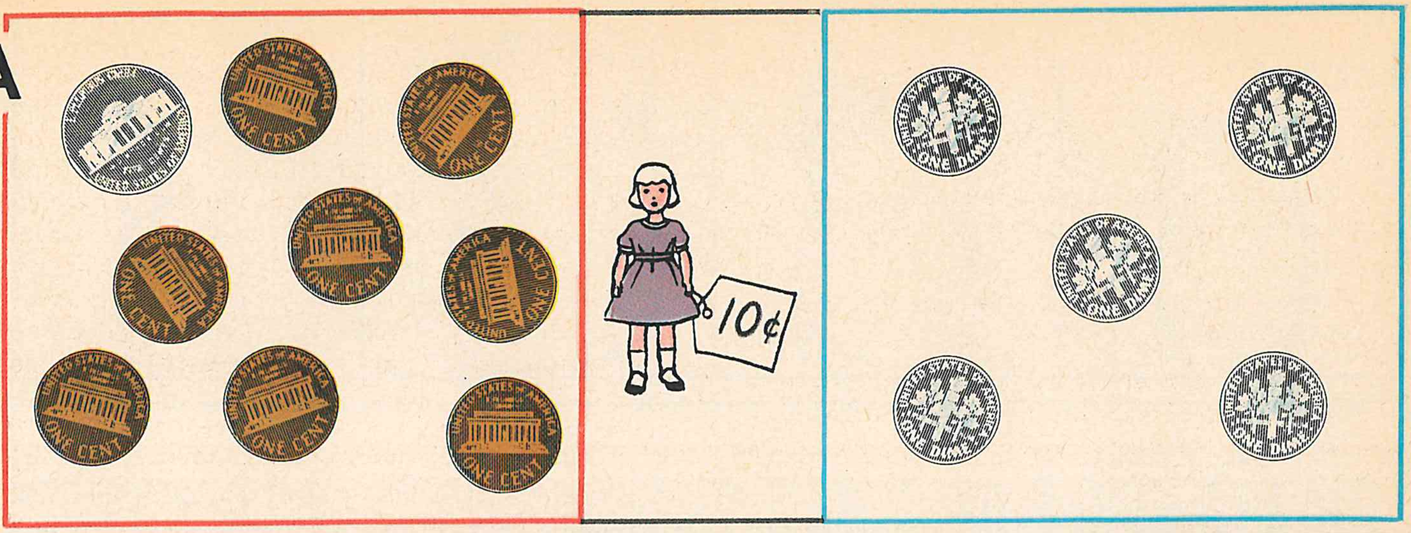

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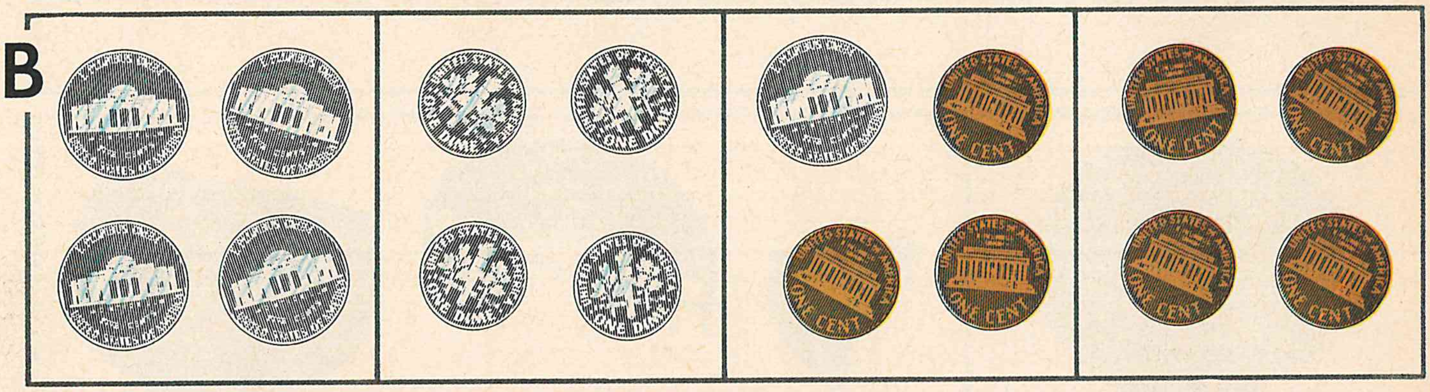

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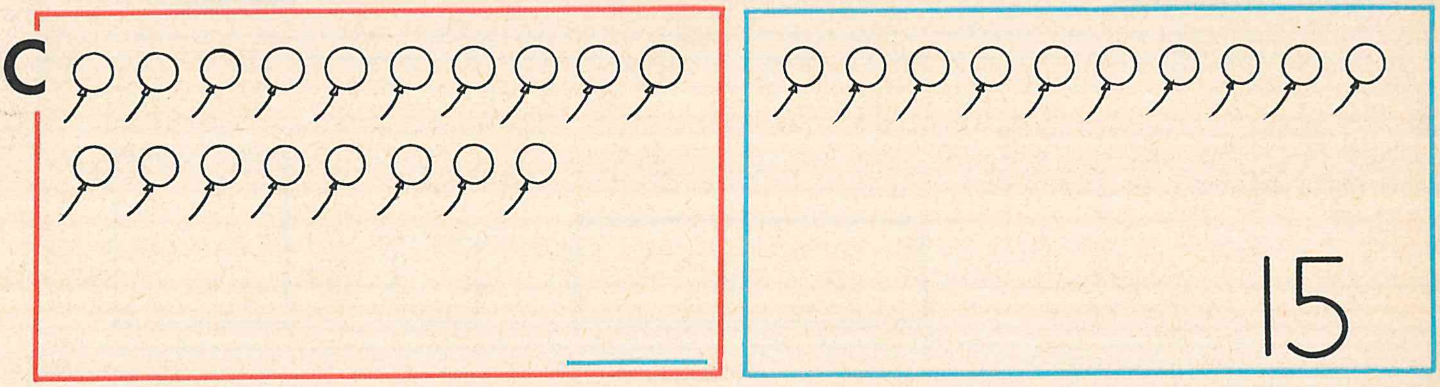

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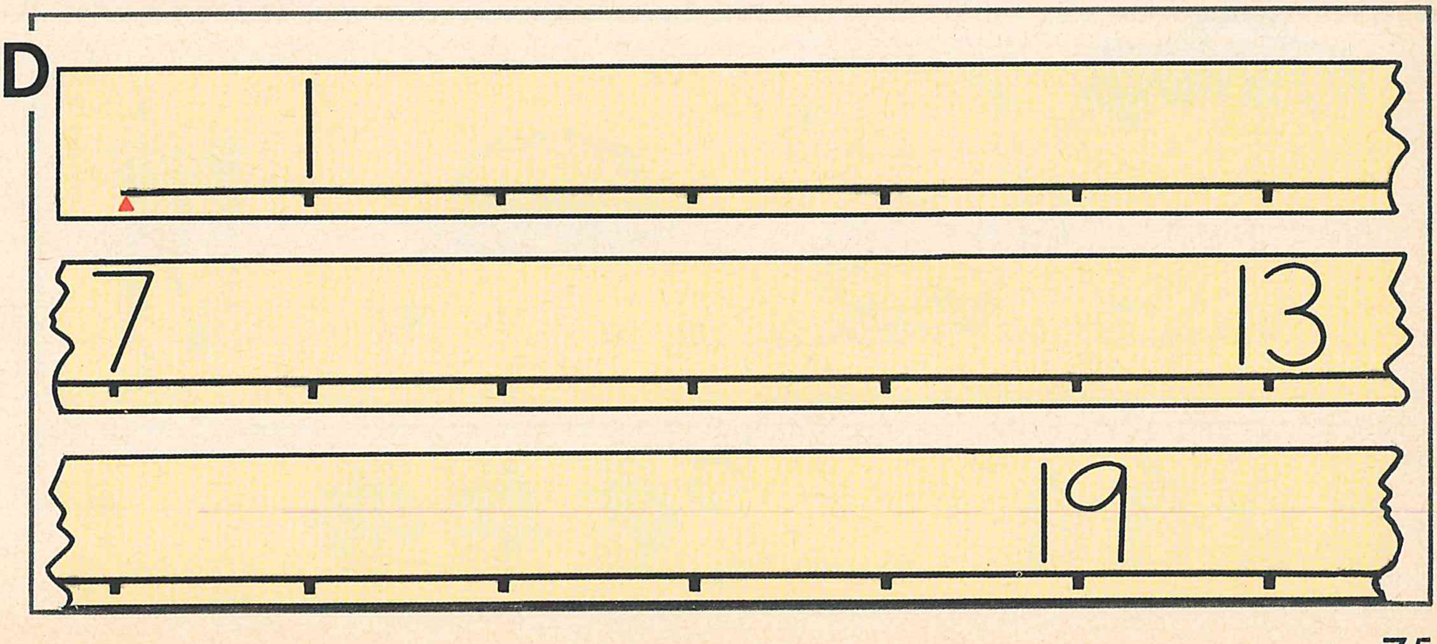

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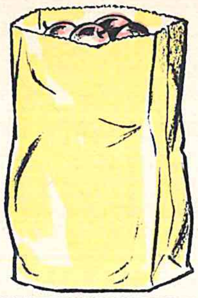

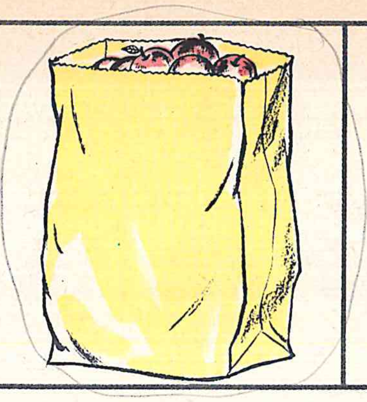

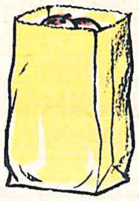

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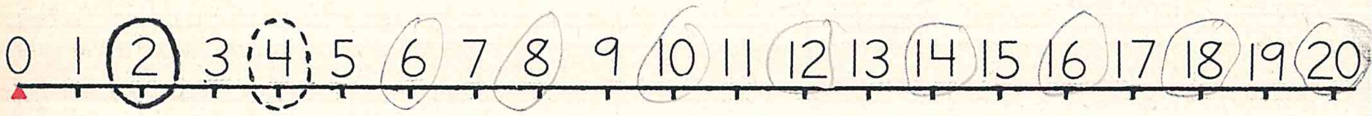

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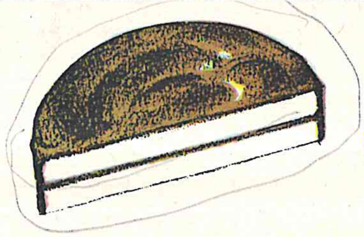

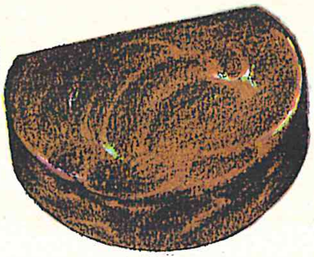

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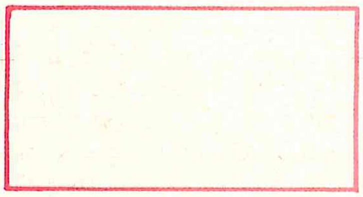

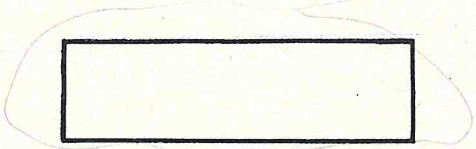

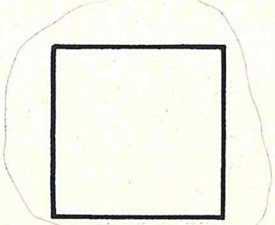

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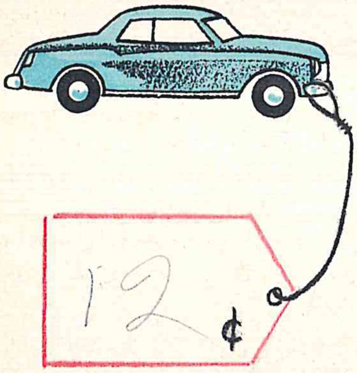

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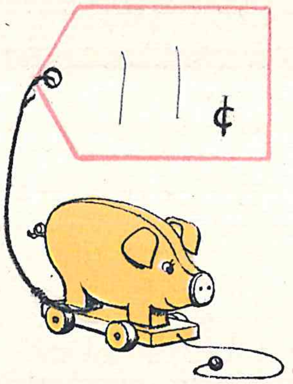

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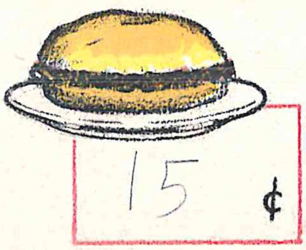

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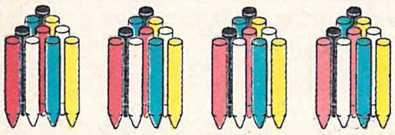

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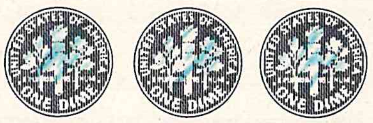

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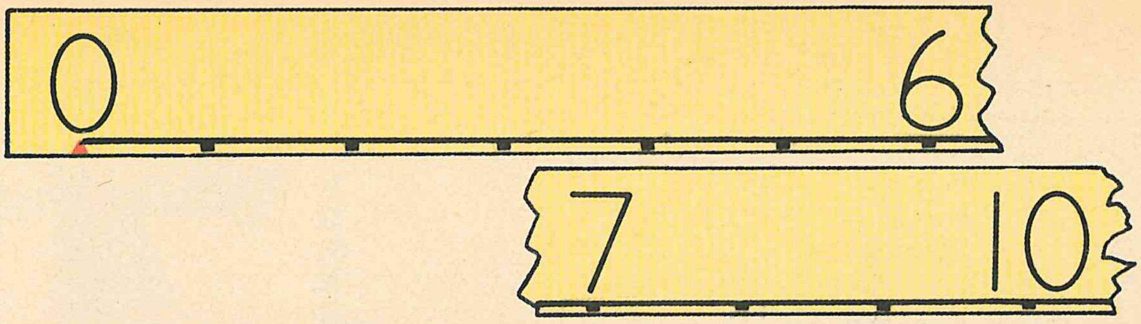

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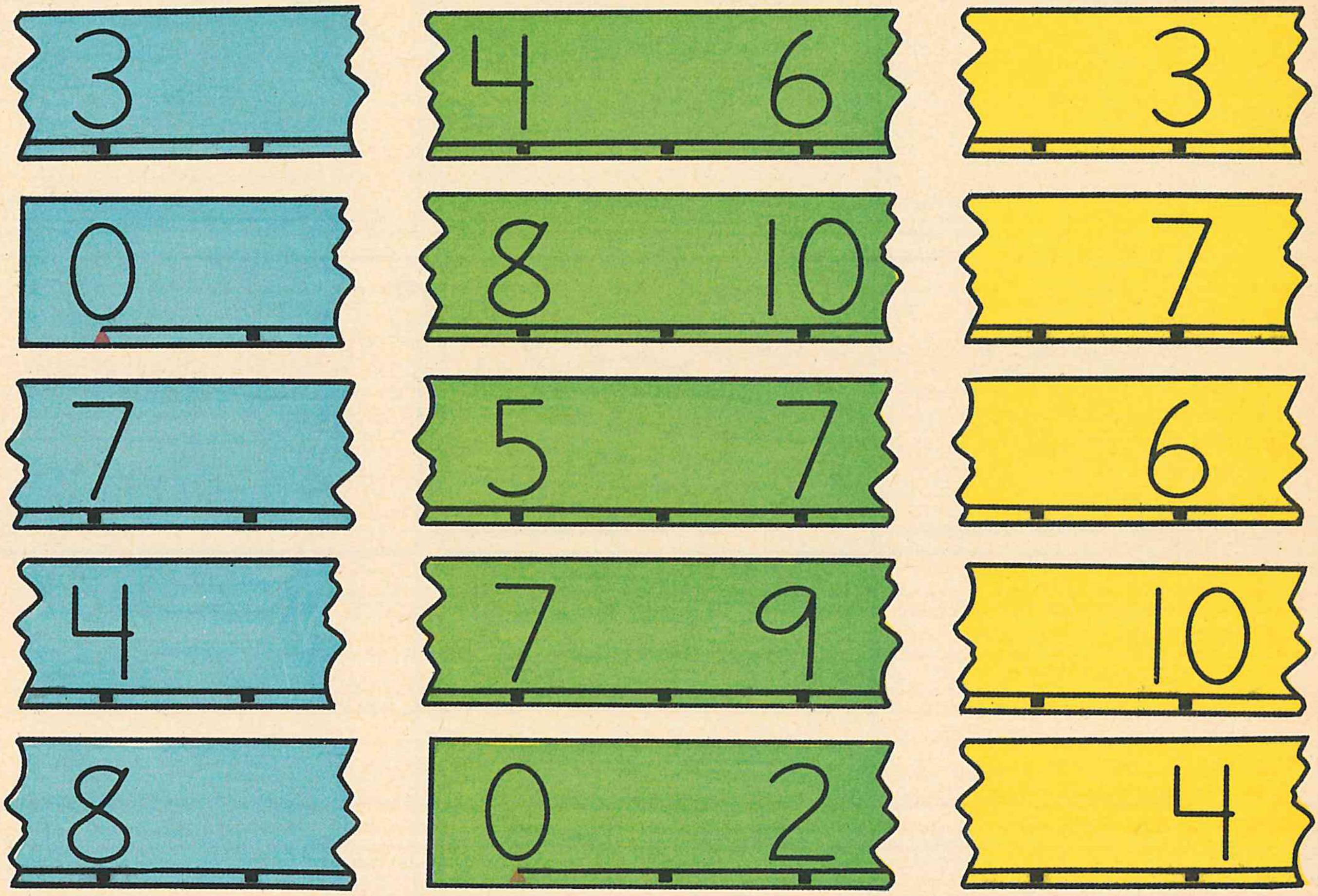

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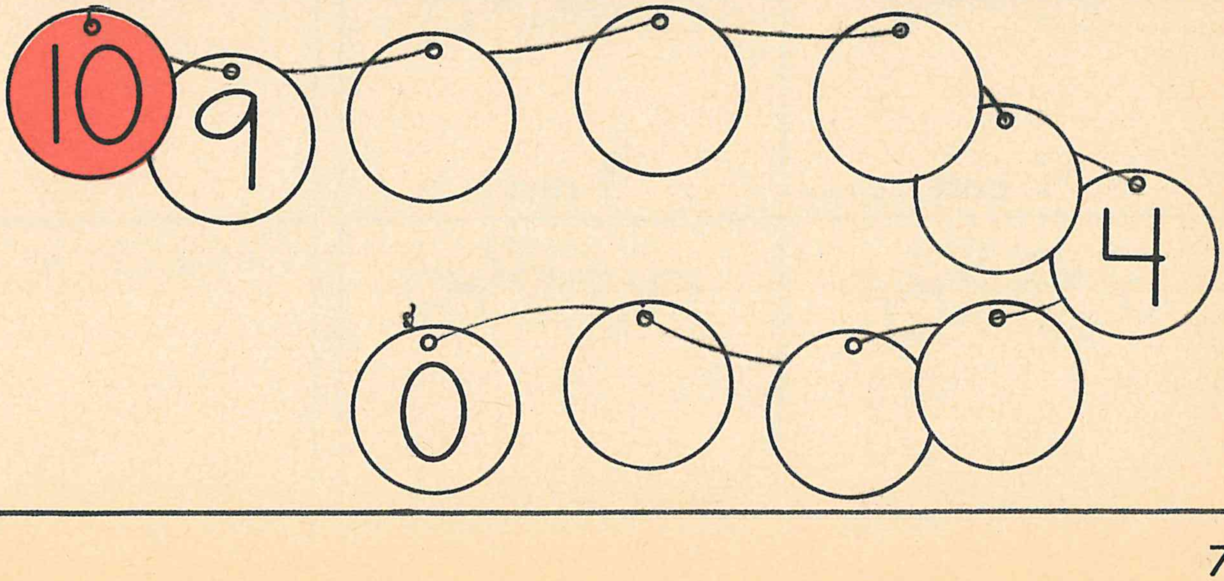

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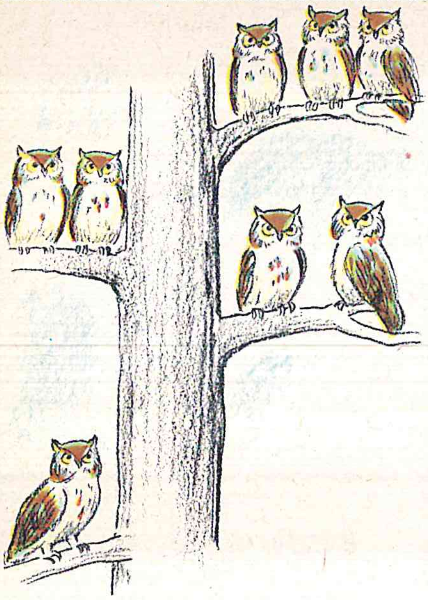

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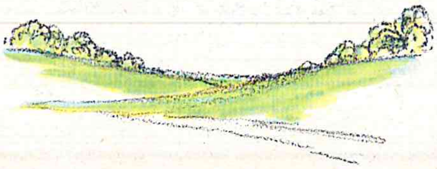

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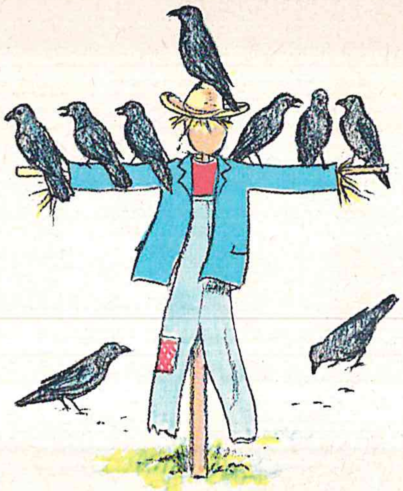

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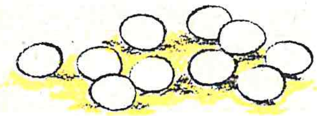

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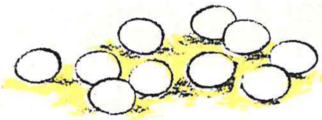

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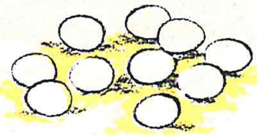

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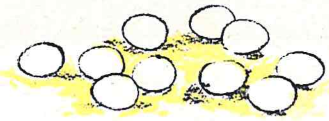

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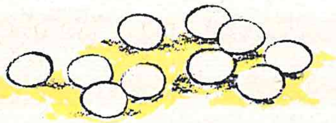

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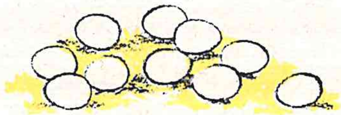

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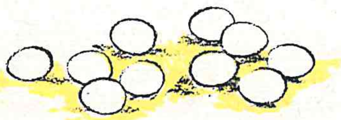

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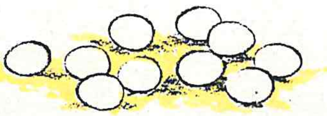

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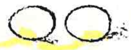

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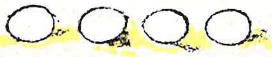

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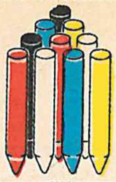
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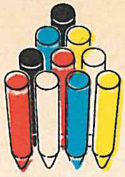
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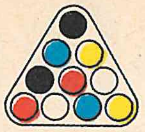
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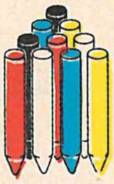
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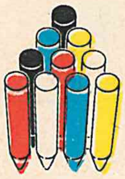
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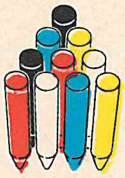
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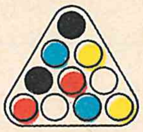
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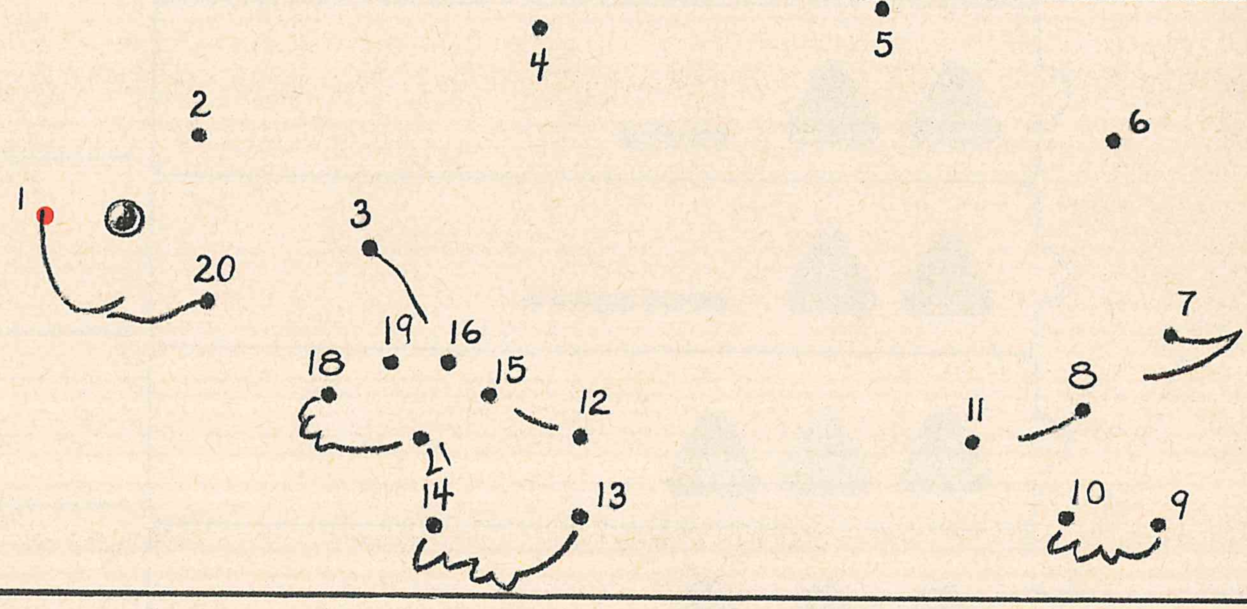

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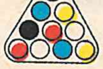
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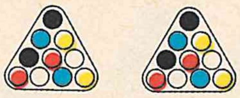
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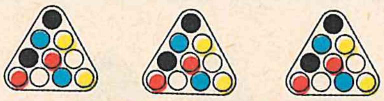
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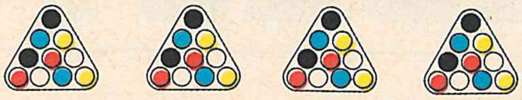
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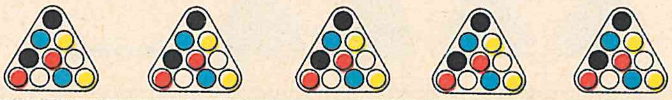
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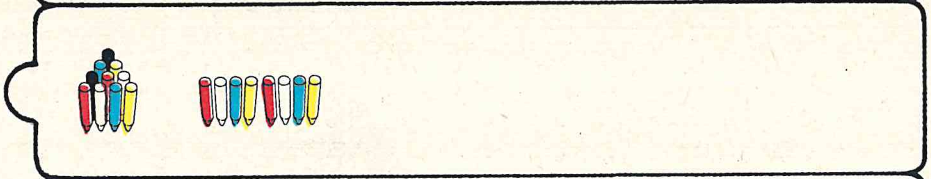

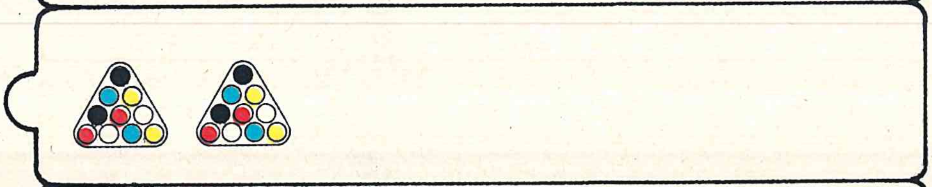

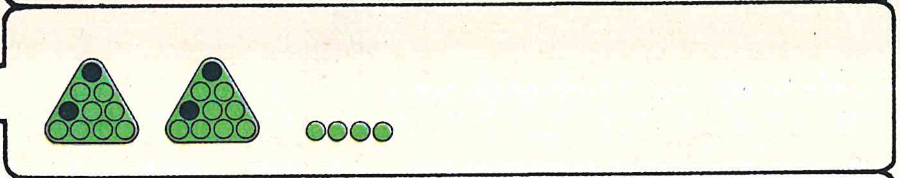

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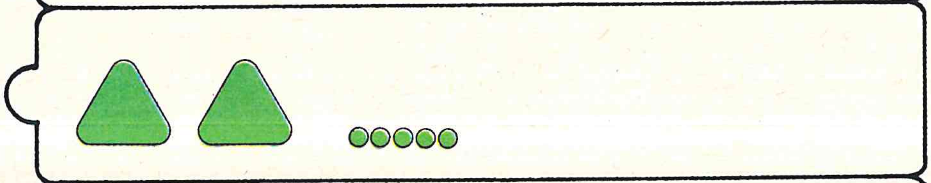

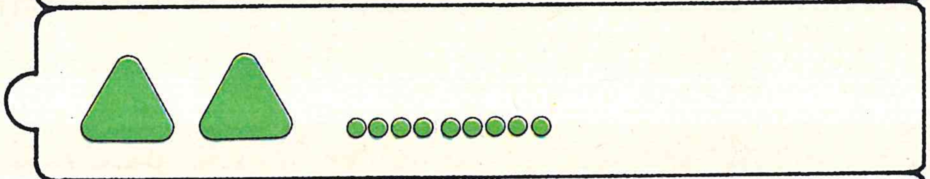

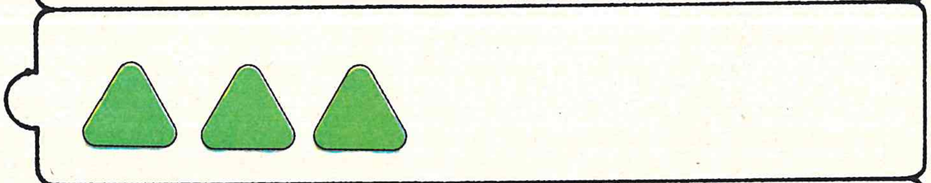

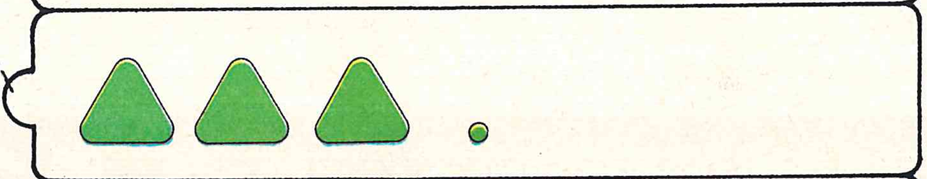

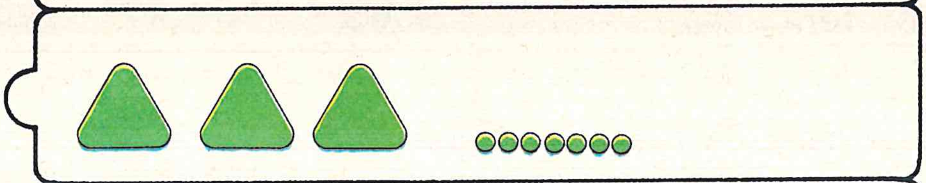

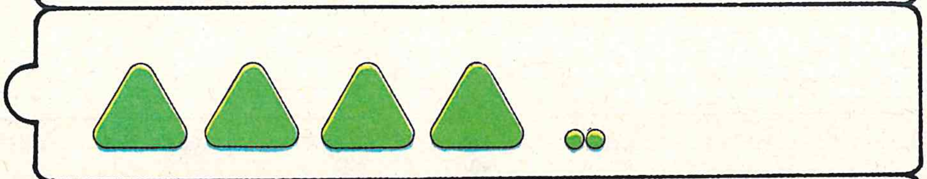

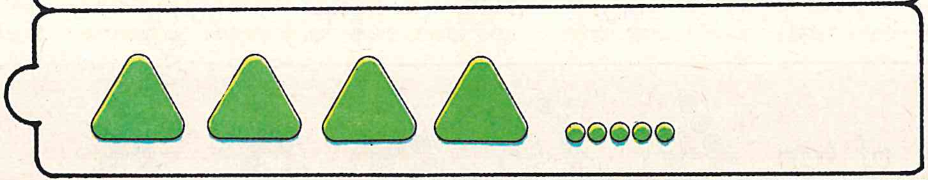

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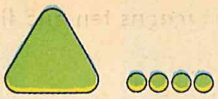
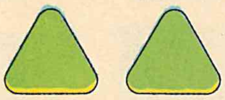
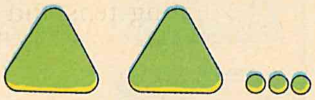
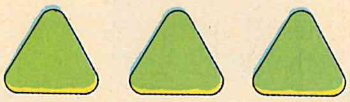
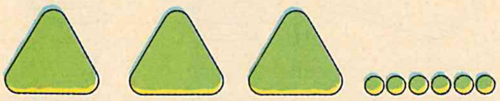
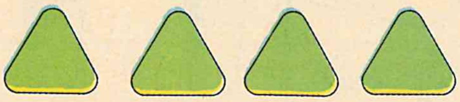
14  1 ten and 4 ones

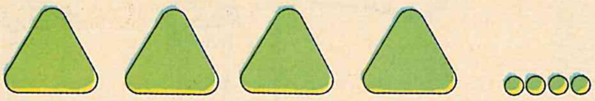
20  2 tens and 0 ones

____  ____ tens and ____ ones

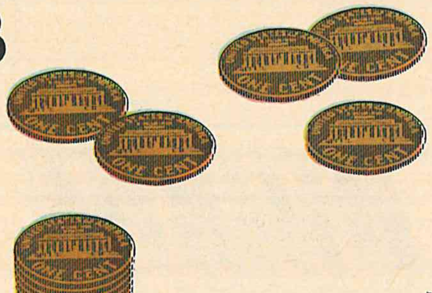
____  ____ tens and ____ ones

____  ____ tens and ____ ones

____  ____ tens and ____ ones

____  ____ tens and ____ ones

B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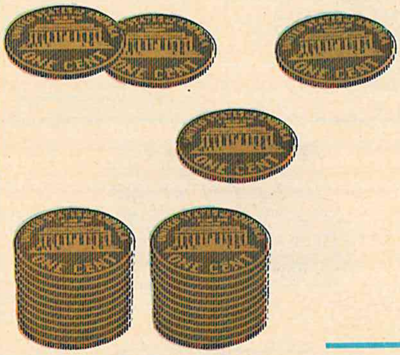
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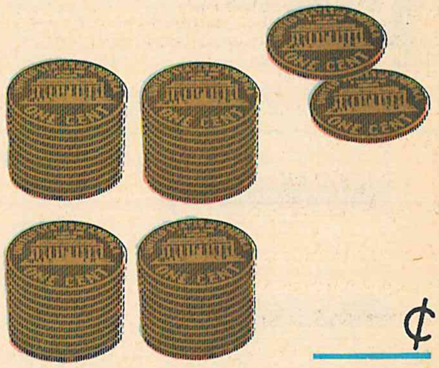
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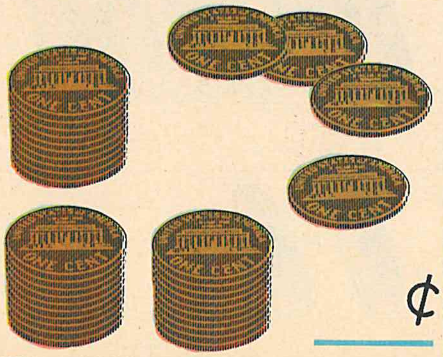
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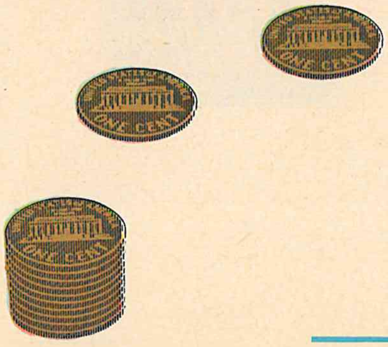
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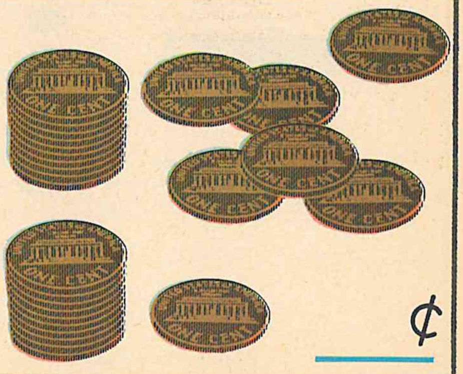
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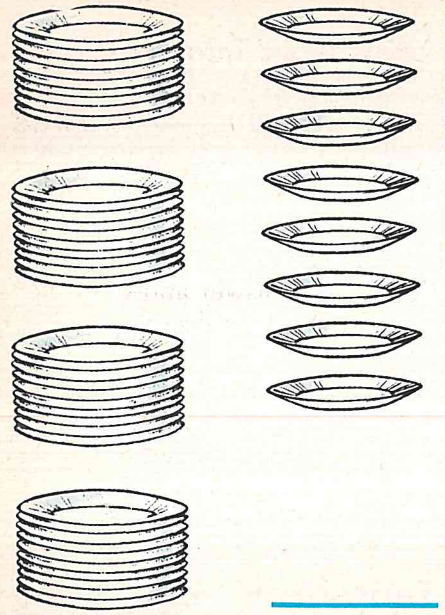

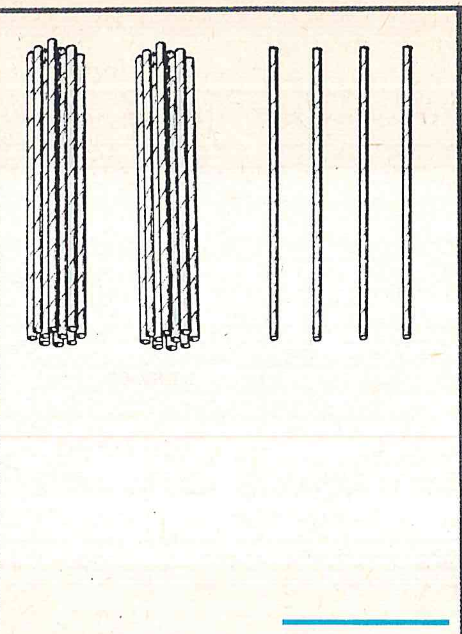

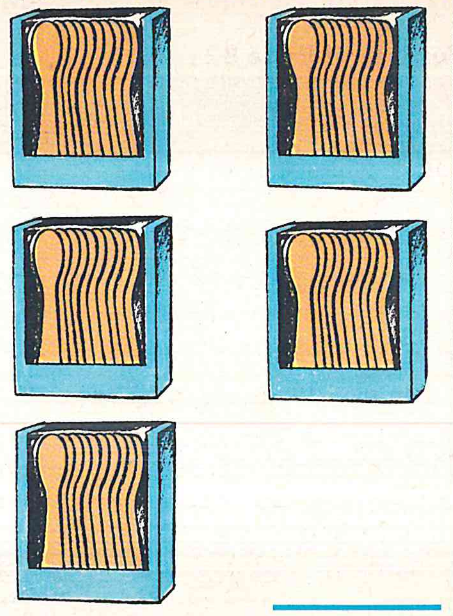

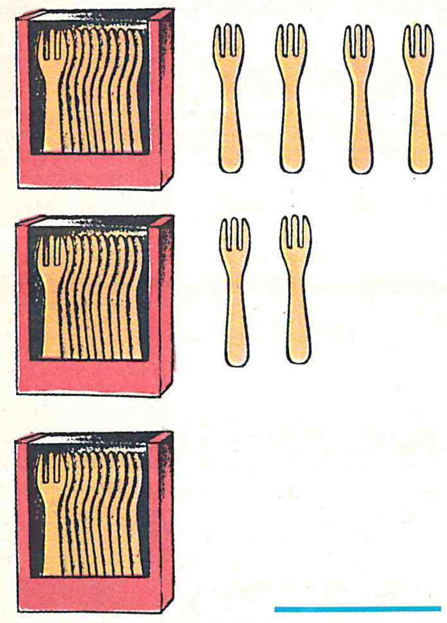

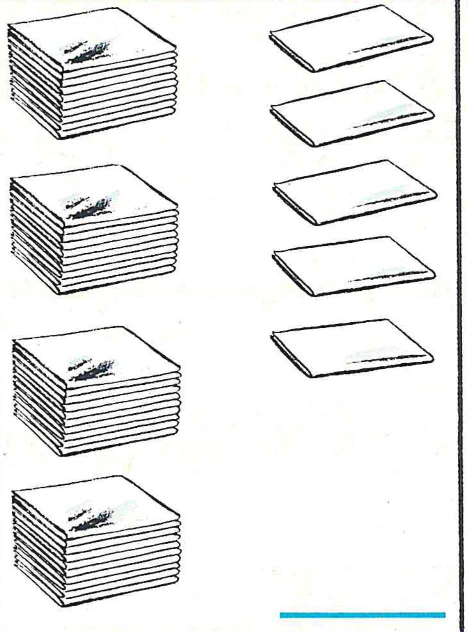

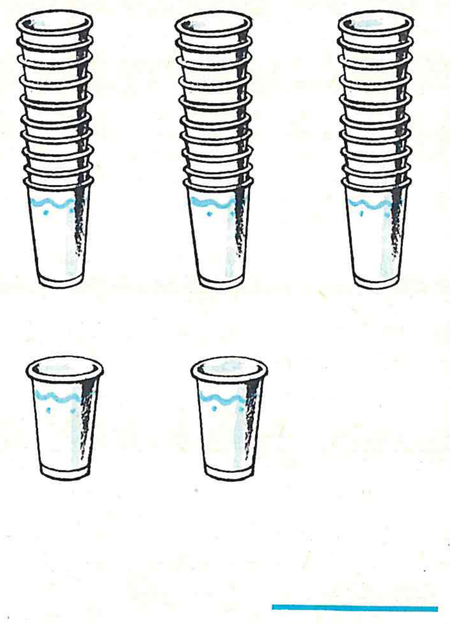

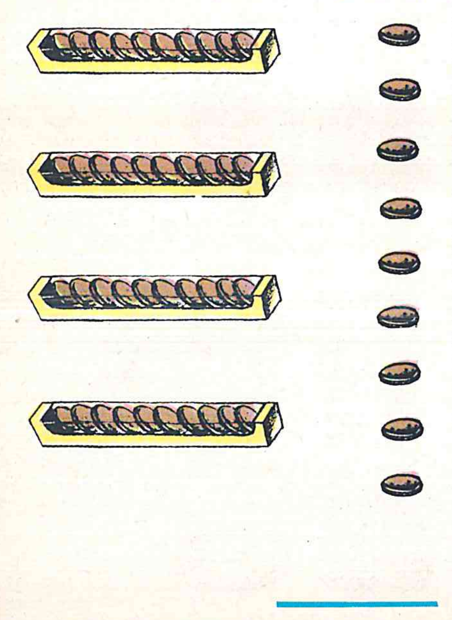

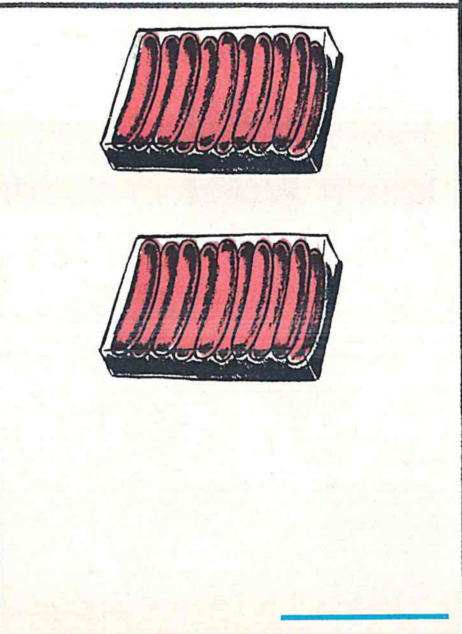

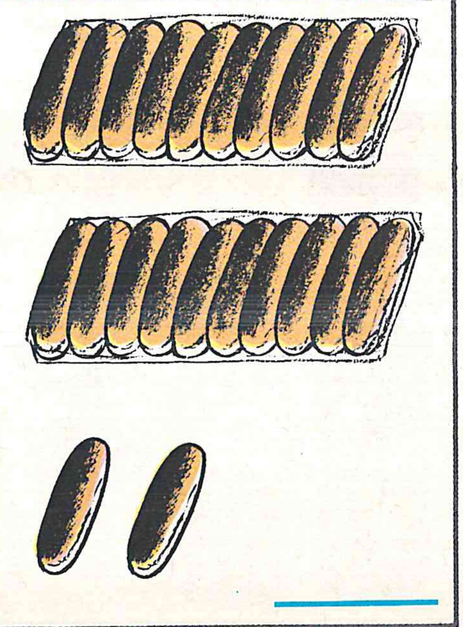

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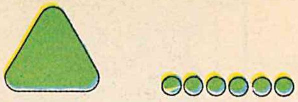
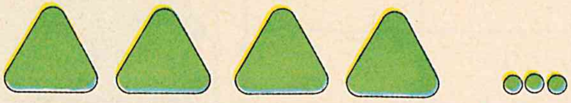
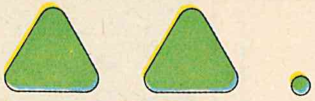
____  ____ ten and ____ ones

____  ____ tens and ____ ones

____  ____ tens and ____ one

B

31 ____ tens and ____ one

15 ____ ten and ____ ones

42 ____ tens and ____ ones

27 ____ tens and ____ ones

C

____ 4 tens and 9 ones

____ 2 tens and 4 ones

____ 1 ten and 7 ones

____ 3 tens and 2 ones

A

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B

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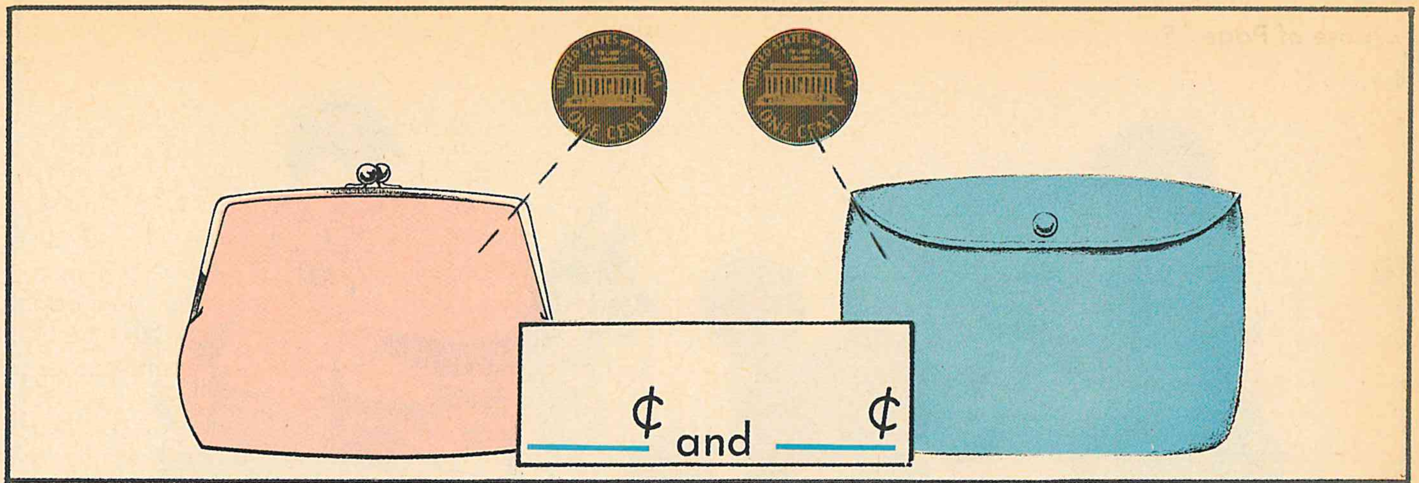

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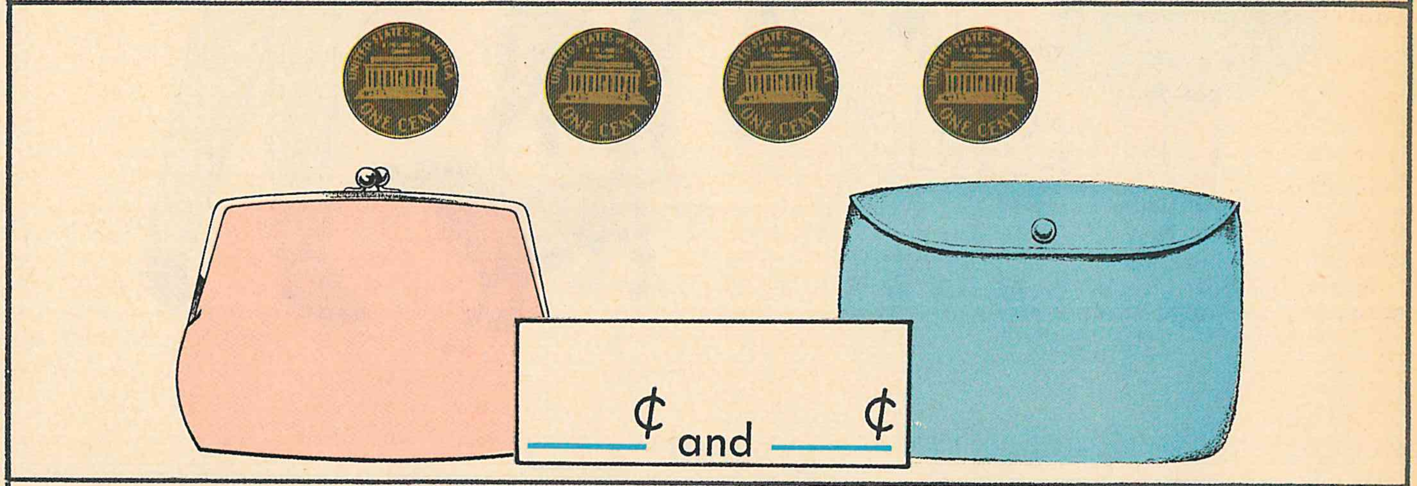

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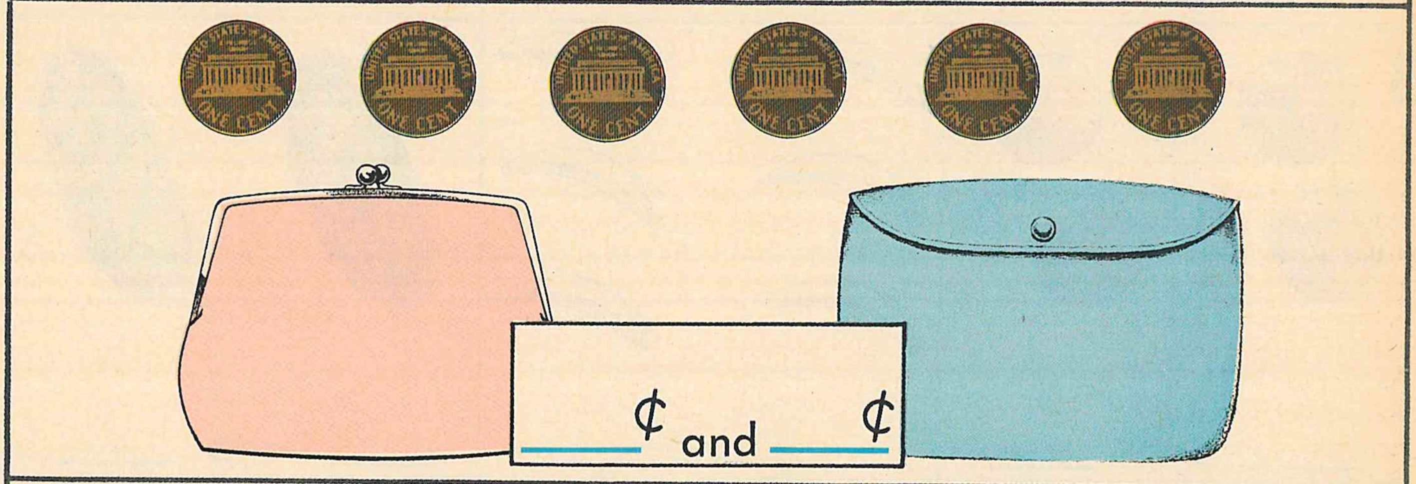

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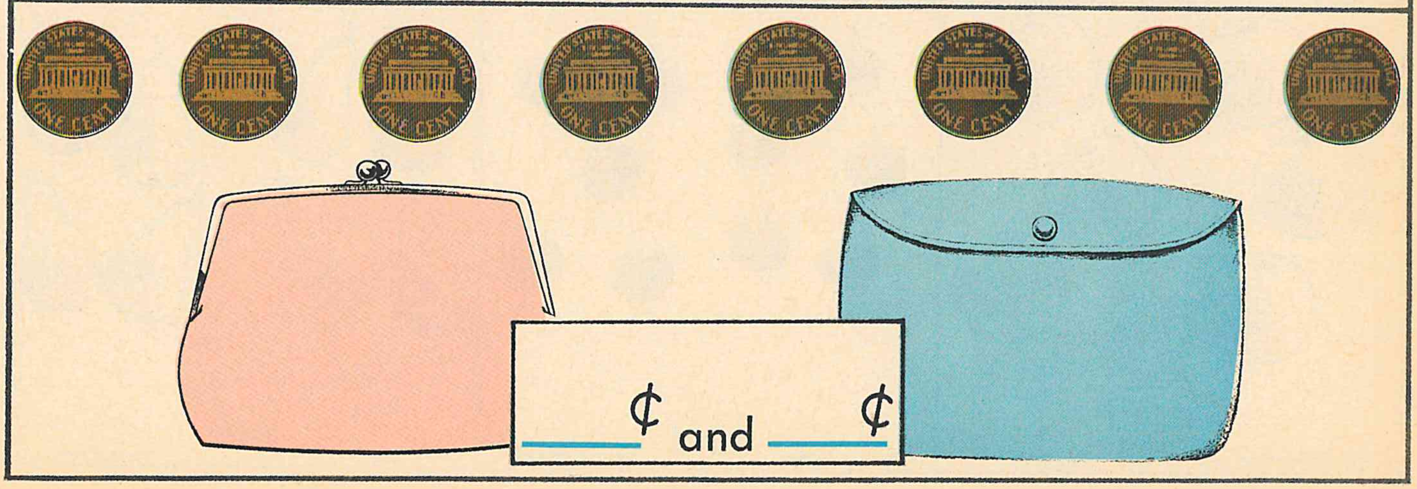

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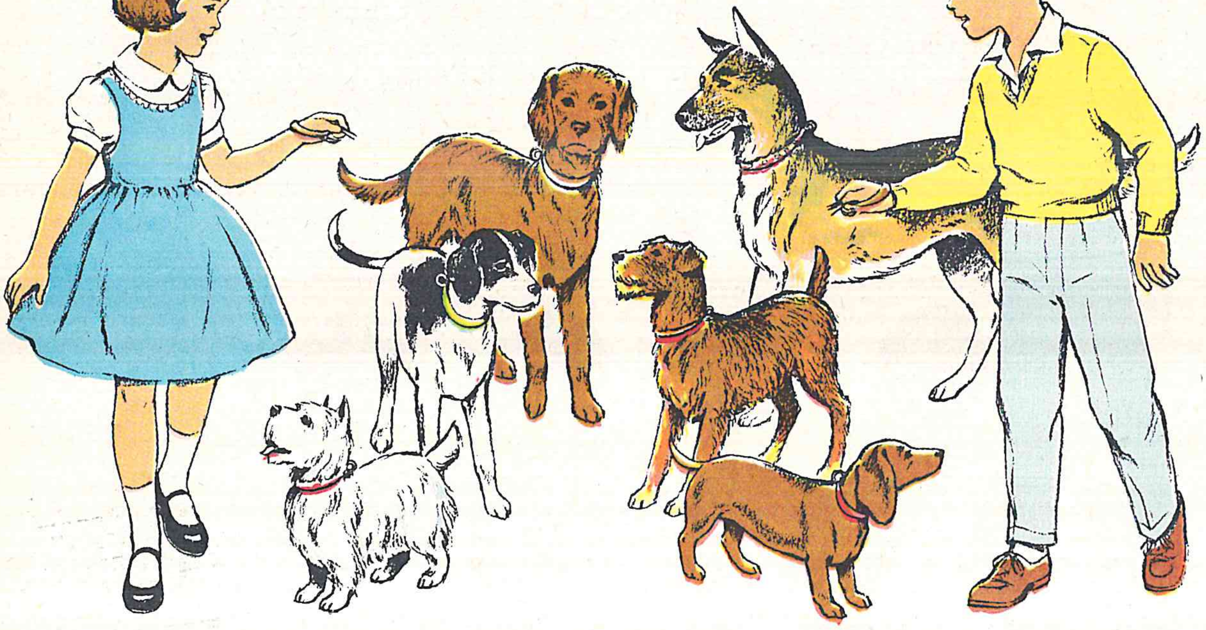
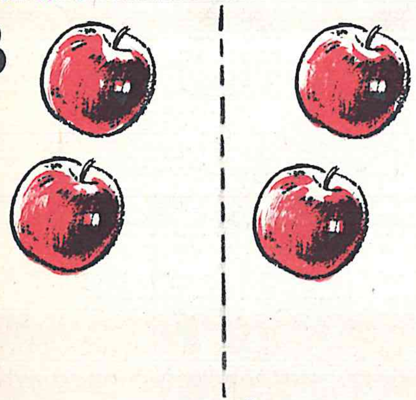


____ and ____

B



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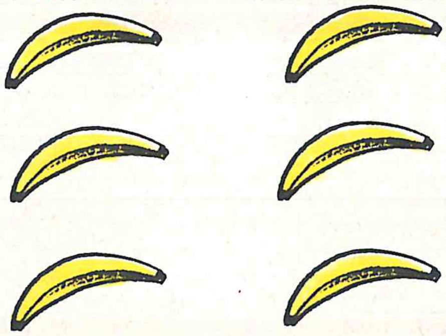

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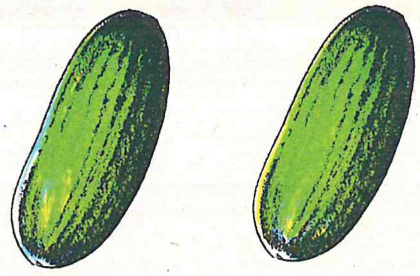

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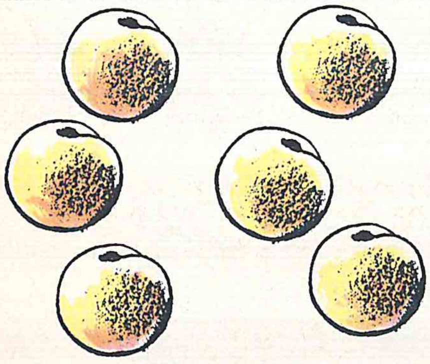

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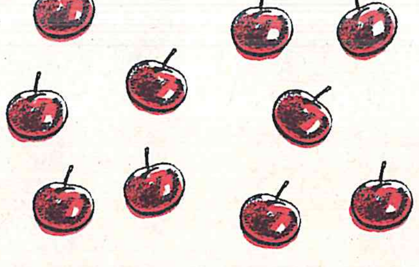

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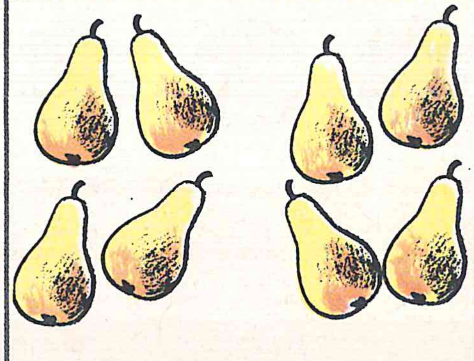
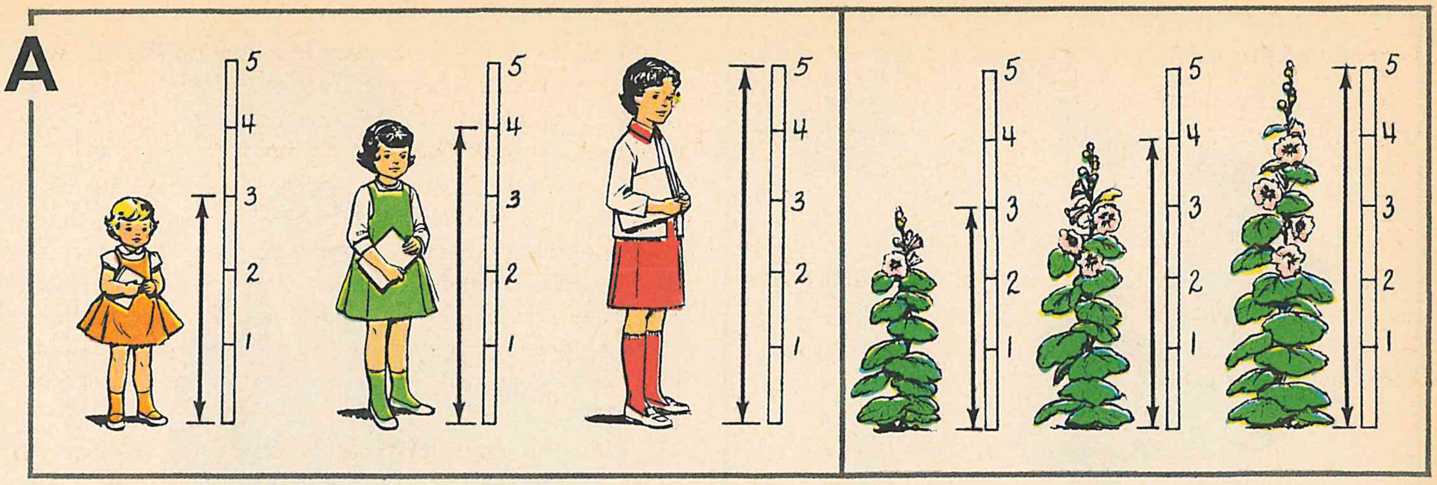


____ and ____

A



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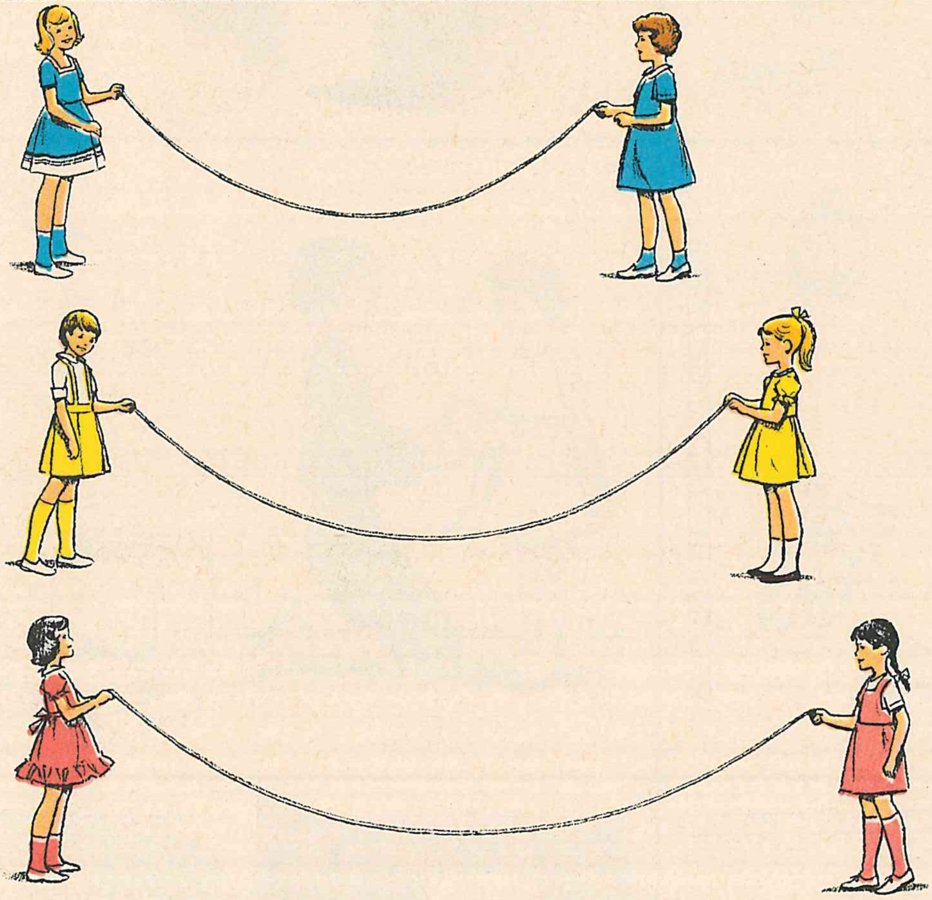

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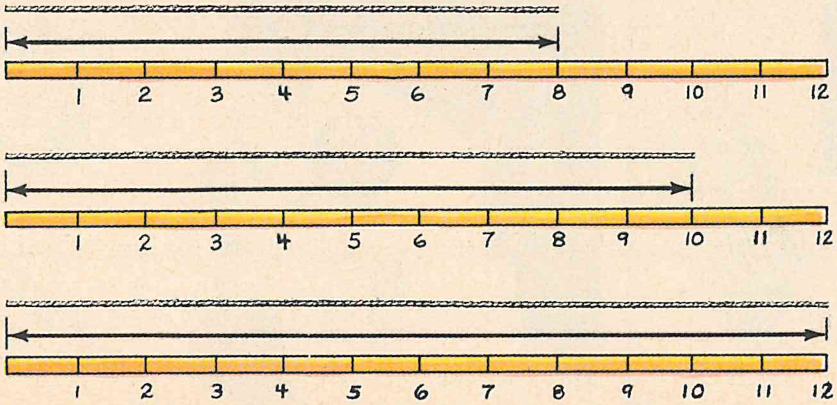

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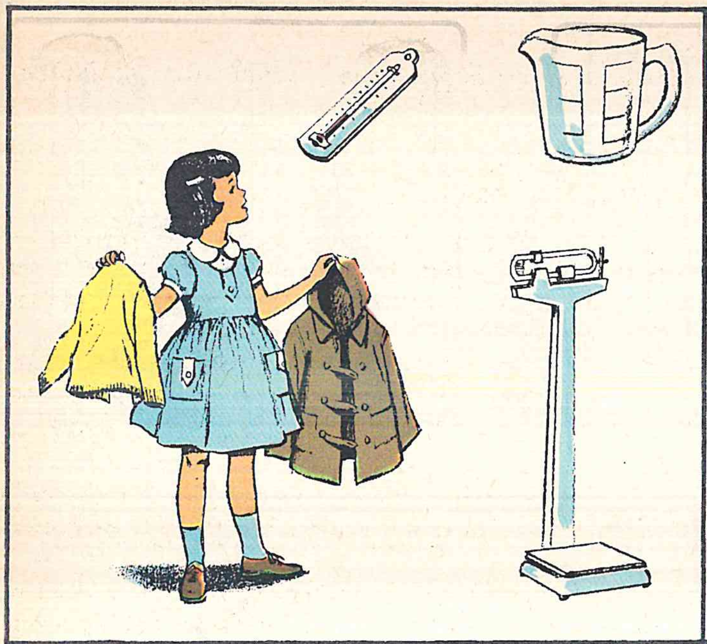
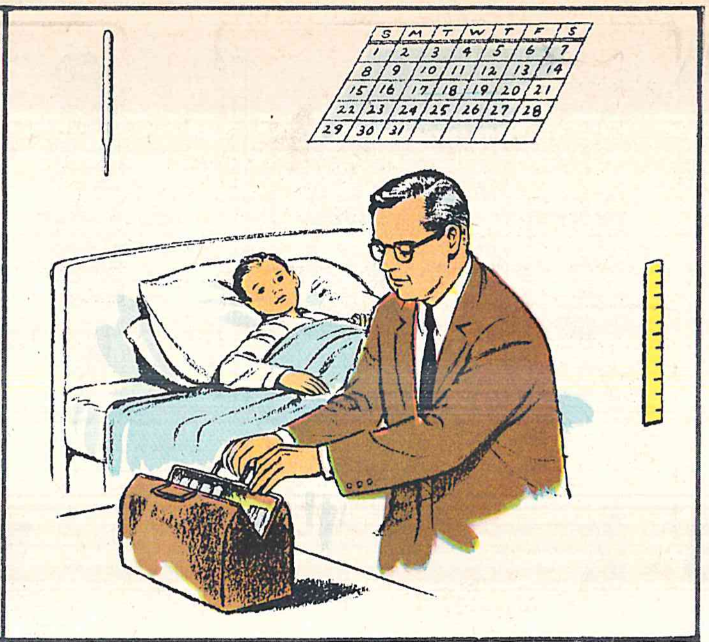
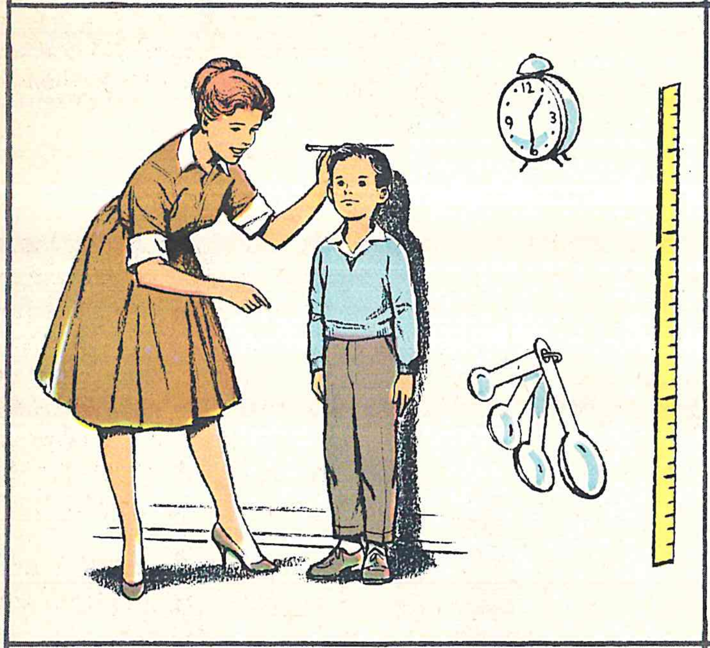
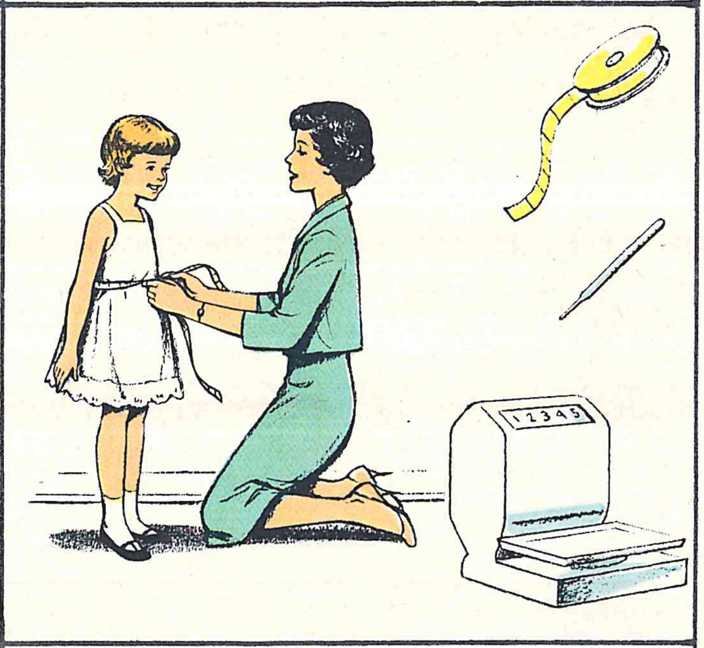



S M T W T F S
1 2 3 4 5 6 7
8 9 10 11 12 13 14
15 16 17 18 19 20 21
22 23 24 25 26 27 28
29 30 31


12
3
6
9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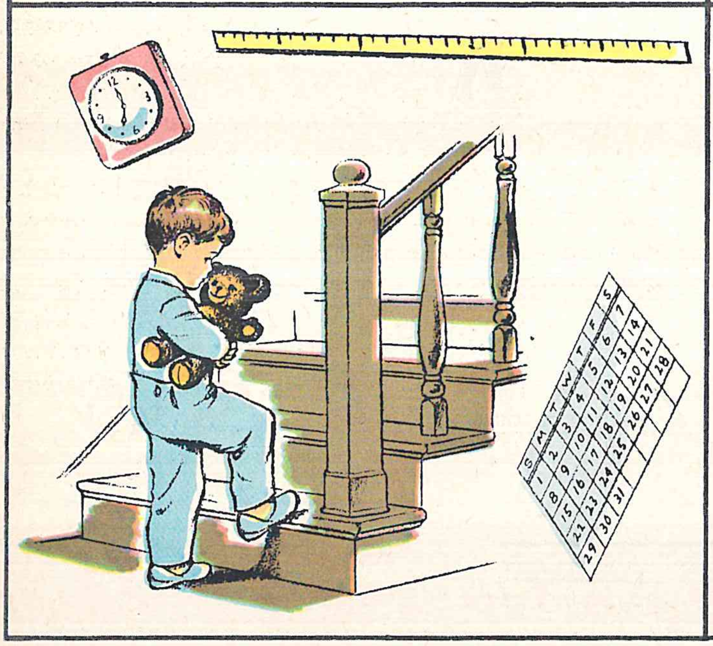
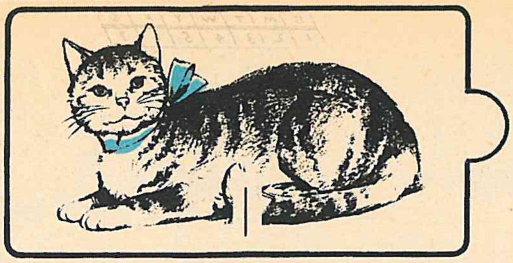
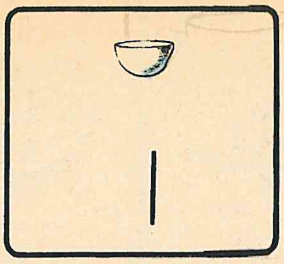

S M T W T F S
1 2 3 4 5 6 7
8 9 10 11 12 13 14
15 16 17 18 19 20 21
22 23 24 25 26 27 28
29 30 31

S M T W T F S
1 2 3 4 5 6 7
8 9 10 11 12 13 14
15 16 17 18 19 20 21
22 23 24 25 26 27 28
29 30 31

A


1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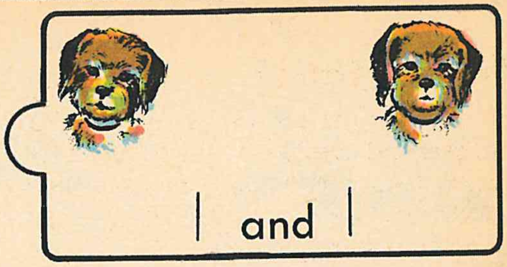
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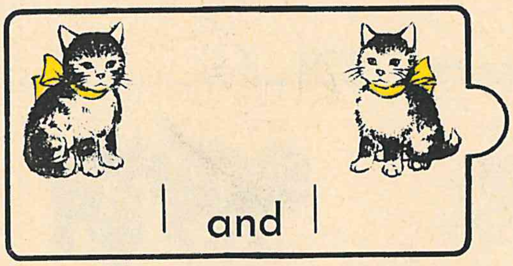
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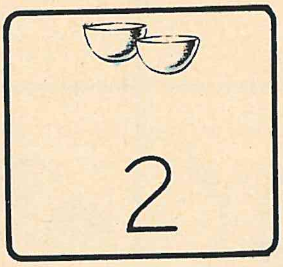
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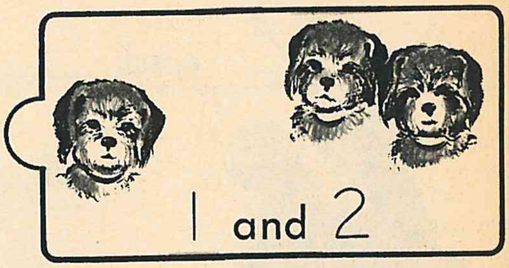
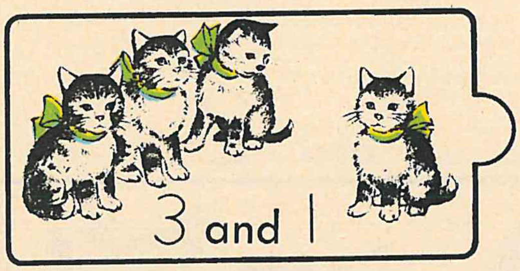
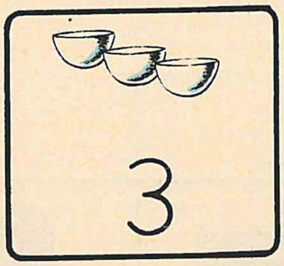

1 and 2


3 and 1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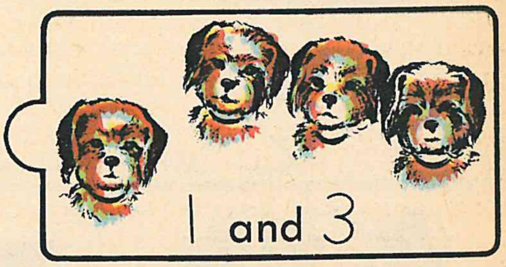
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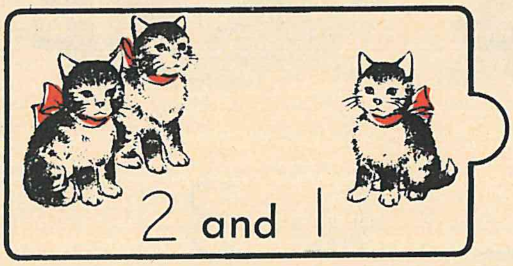
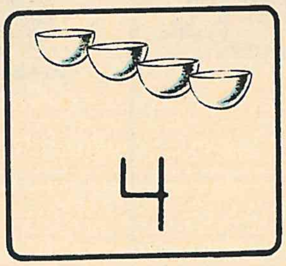

2 and 1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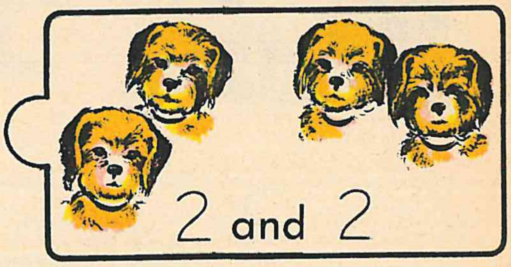
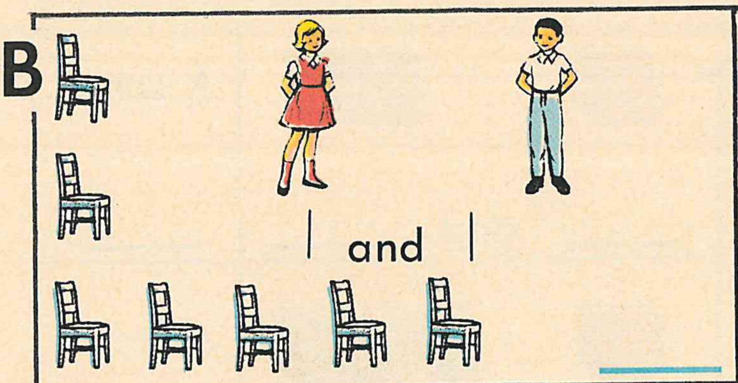
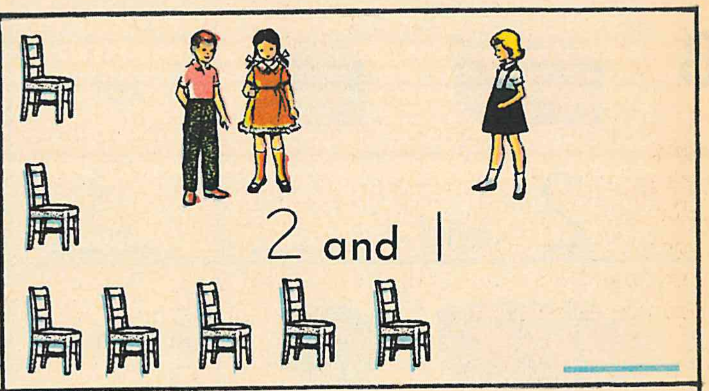
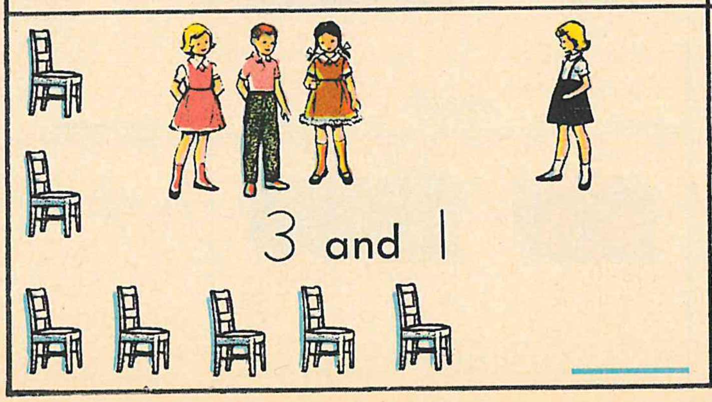
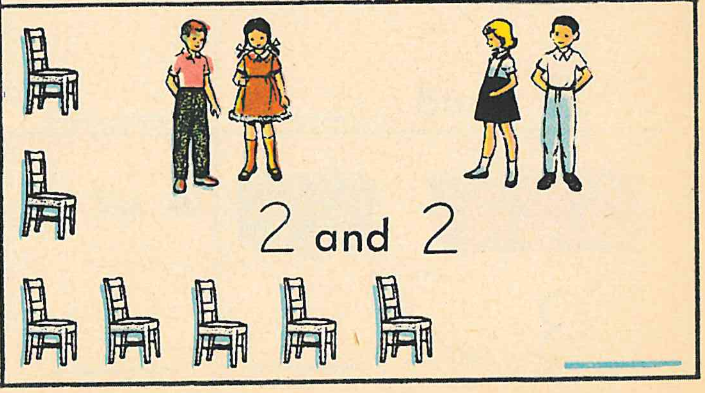

2 and 2

B

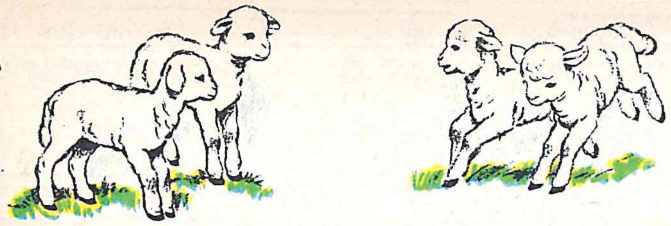

1 and 1


2 and 1

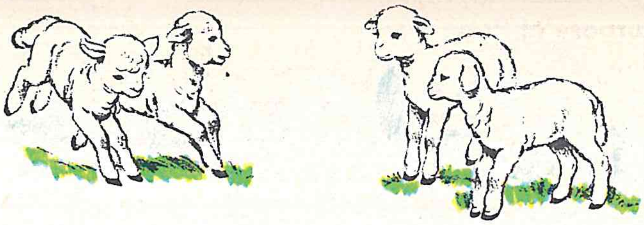

3 and 1


2 and 2

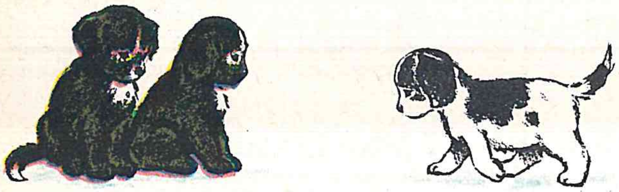
A



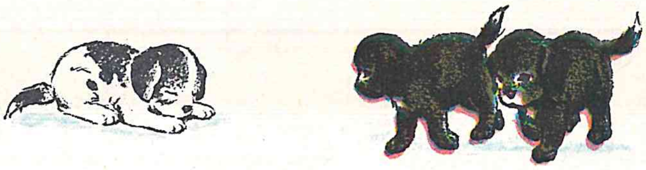
2 and ____



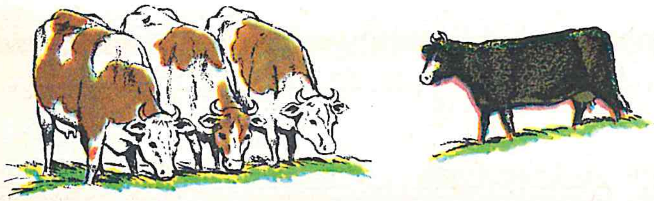
____ and 2



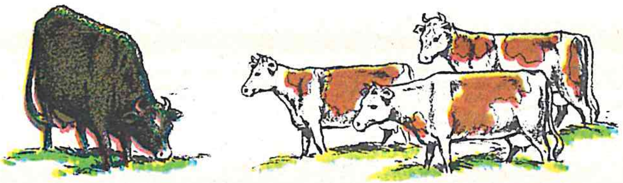
2 and ____



____ and 2

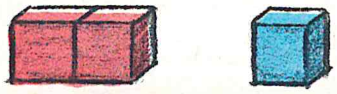


3 and ____



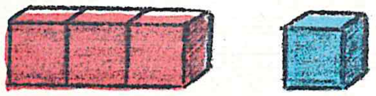
____ and 3

B



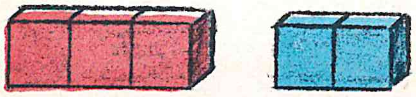
2 and ____

A set of 3.



3 and ____

A set of ____.



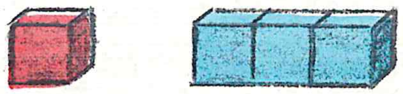
3 and ____

A set of ____.

C

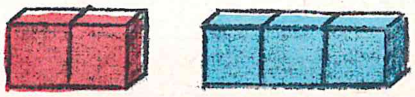
____ and ____

A set of ____.



____ and ____

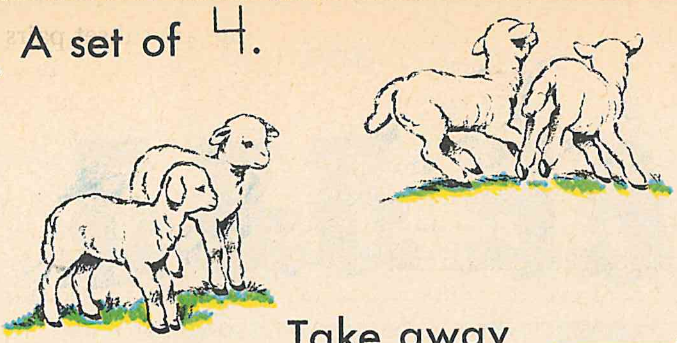
A set of ____.



____ and ____

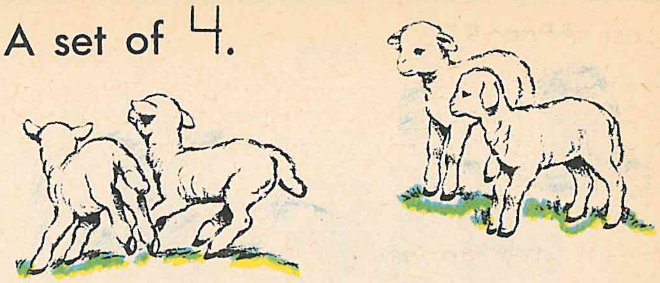
A set of ____.

A A set of 4.



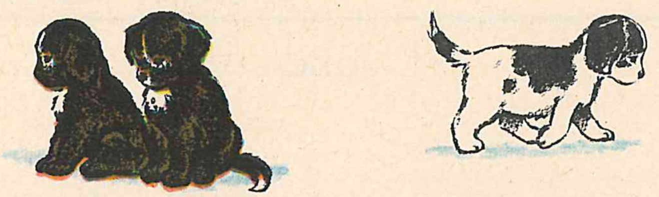
Take away ____.

A set of 4.



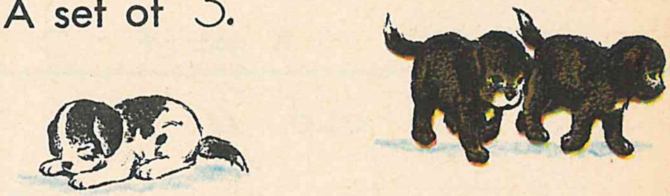
Take away ____.

A set of 3.



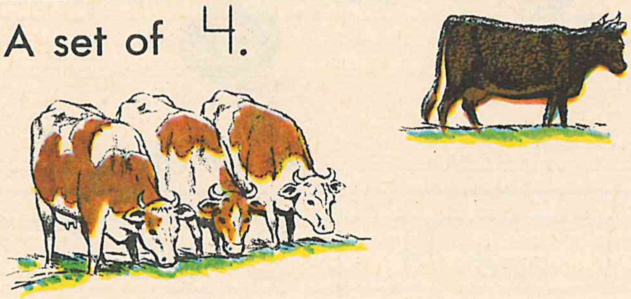
Take away ____.

A set of 3.



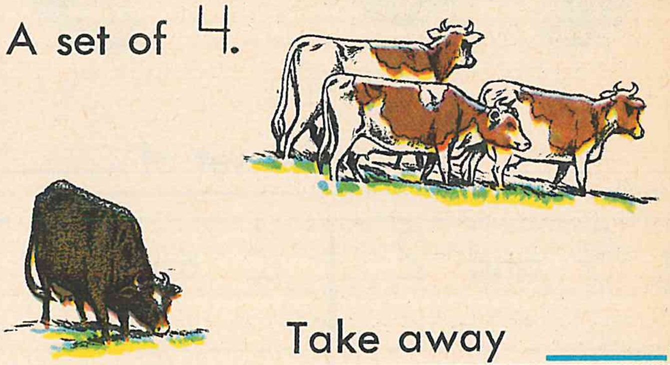
Take away ____.

A set of 4.



Take away ____.

A set of 4.

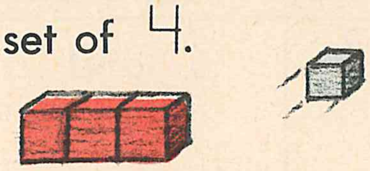


Take away ____.

B A set of 3.

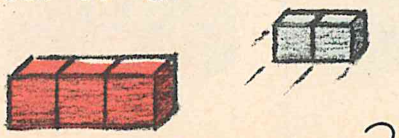
Take away 1. 2 are left.

A set of 4.



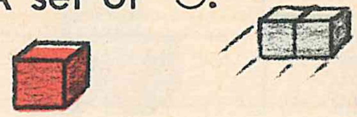
Take away 1. ____ are left.

A set of 5.



Take away 2. ____ are left.

C A set of 3.



Take away 2. ____ is left.

A set of 4.

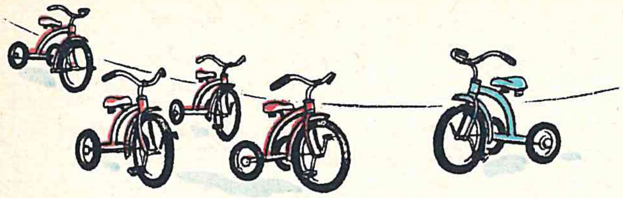
Take away 3. ____ is left.

A set of 5.

Take away 3. ____ are left.

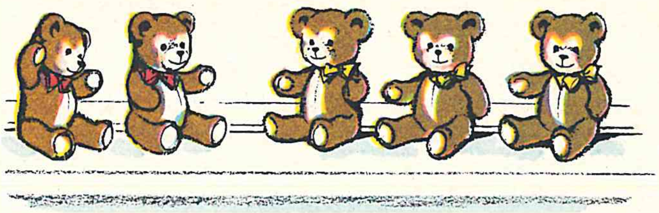
A

4 and 1



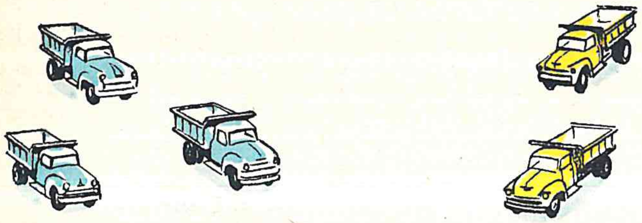
A set of 5.

2 and 3



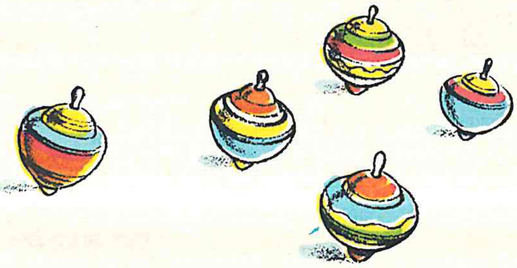
A set of ____.

3 and 2



A set of ____.

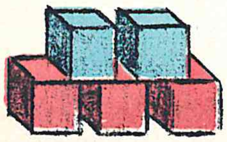
1 and 4



A set of ____.

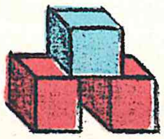
B

3 and 2



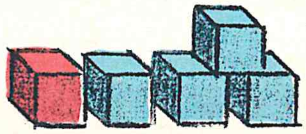
A set of ____.

2 and 1



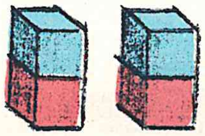
A set of ____.

1 and 4



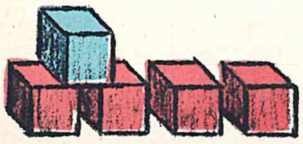
A set of ____.

2 and 2



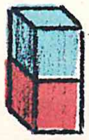
A set of ____.

4 and 1



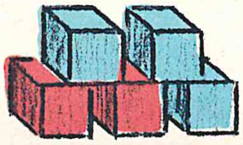
A set of ____.

1 and 1



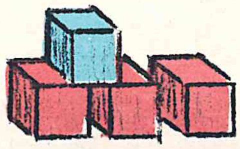
A set of ____.

2 and 3



A set of ____.

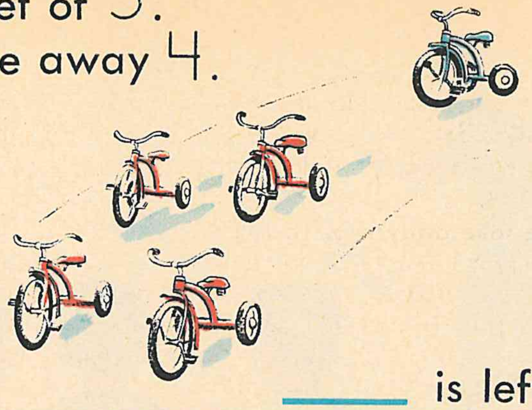
3 and 1



A set of ____.

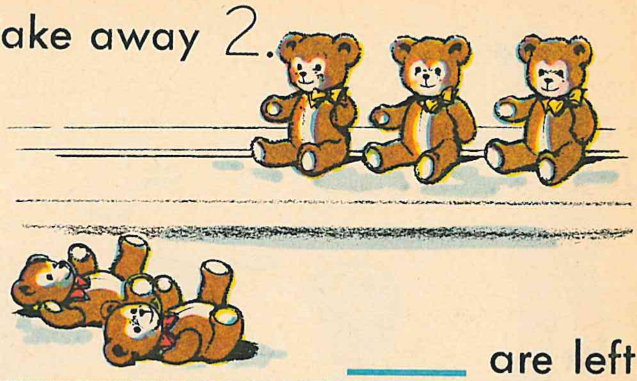
A

A set of 5.
Take away 4.



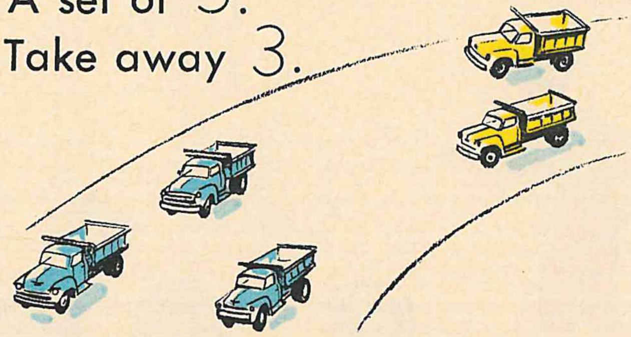
_____ is left.

A set of 5.
Take away 2.



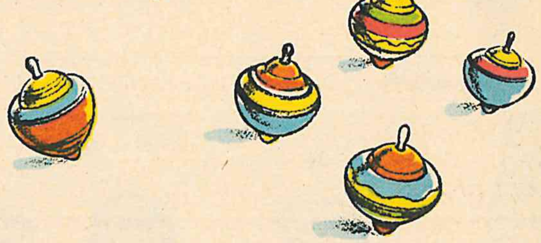
_____ are left.

A set of 5.
Take away 3.



_____ are left.

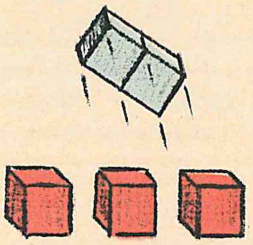
A set of 5.
Take away 1.



_____ are left.

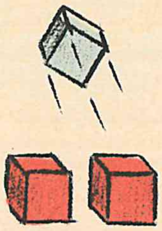
B

A set of 5.
Take away 2.



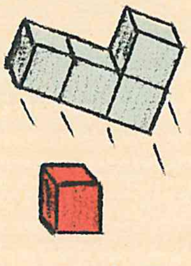
_____ are left.

A set of 3.
Take away 1.



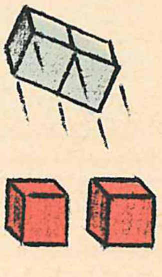
_____ are left.

A set of 5.
Take away 4.



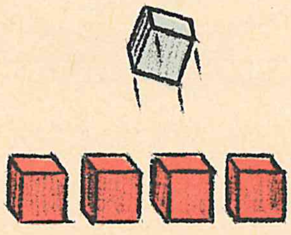
_____ is left.

A set of 4.
Take away 2.



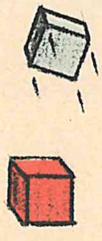
_____ are left.

A set of 5.
Take away 1.



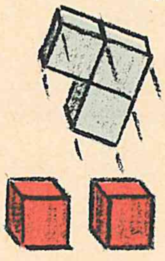
_____ are left.

A set of 2.
Take away 1.



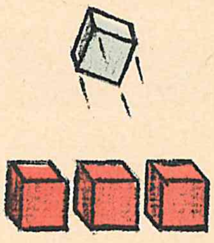
_____ is left.

A set of 5.
Take away 3.



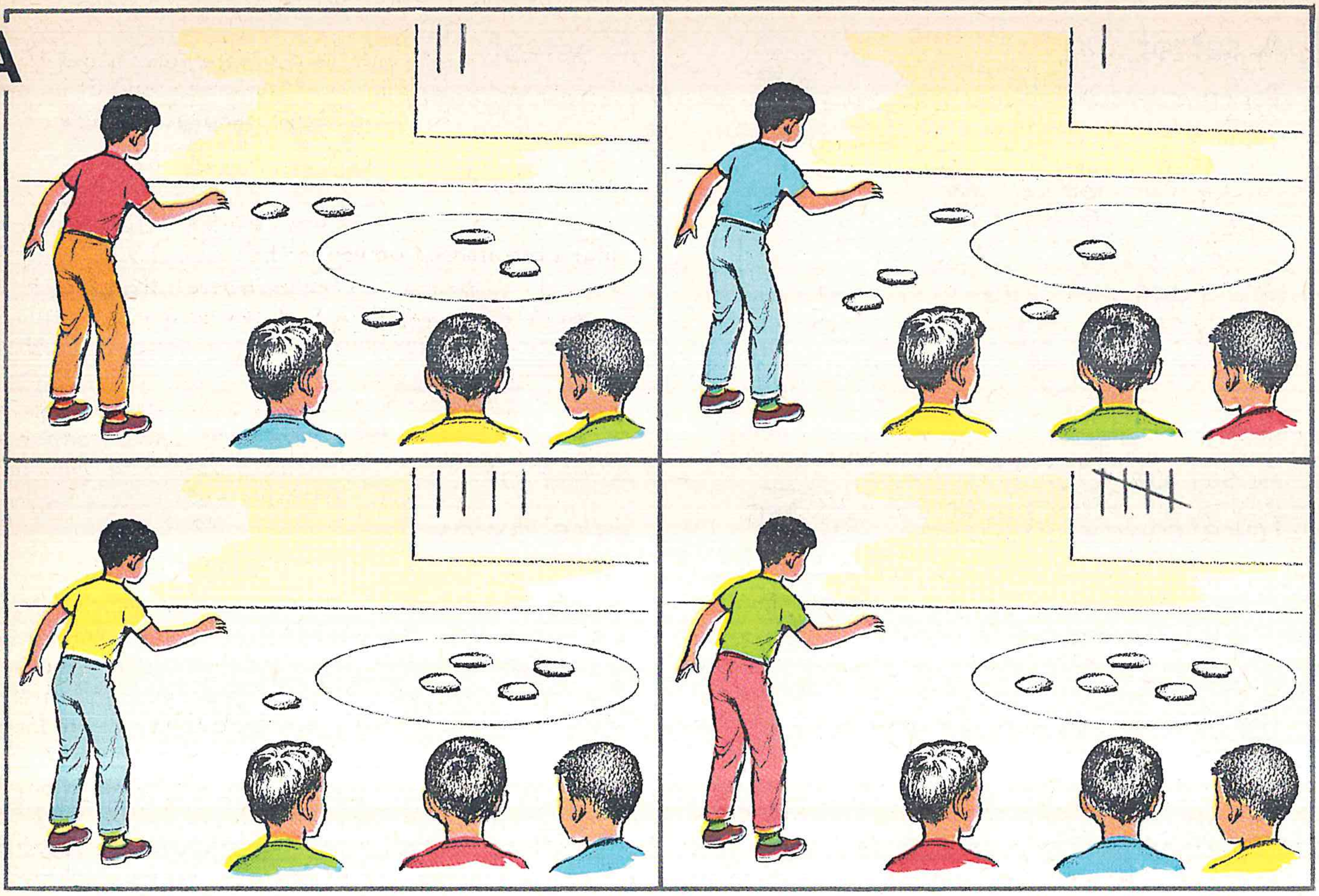
_____ are left.

A set of 4.
Take away 1.

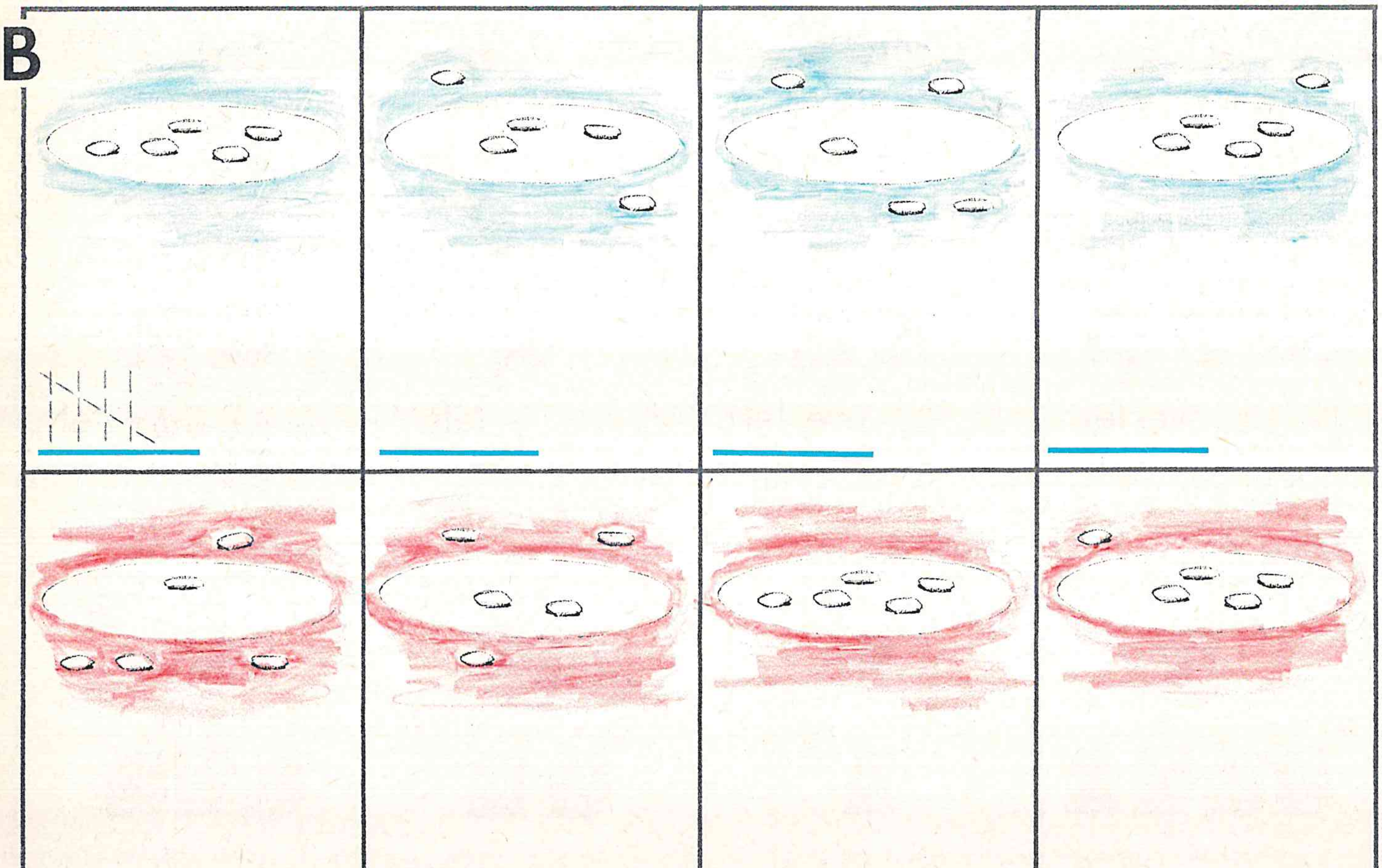


_____ are left.

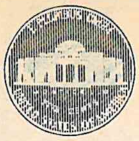
A



B



A



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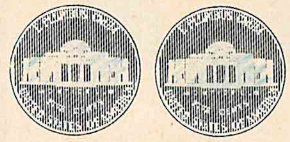

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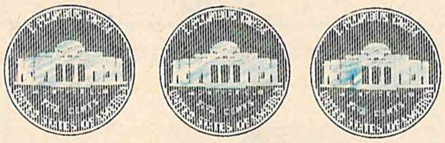

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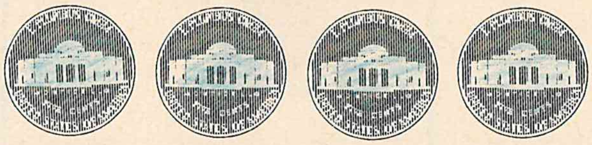

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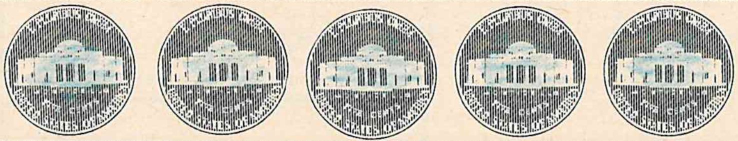

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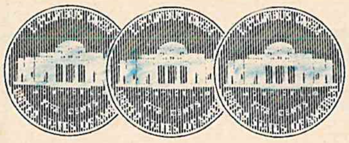

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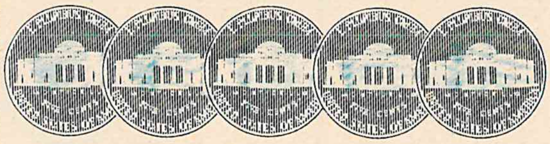

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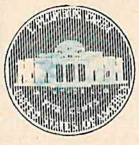

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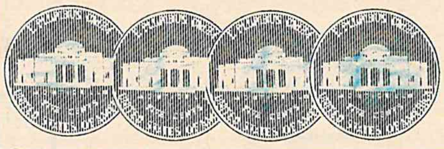

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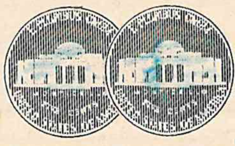

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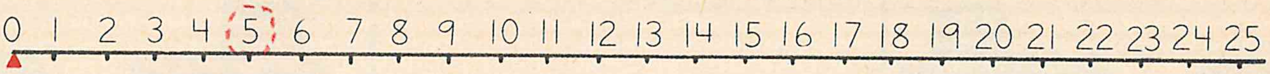

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21	22	23	24	25	26	27	28	29	30
31	32	33	34	35	36	37	38	39	40
41	42	43	44	45	46	47	48	49	50

1 and 0

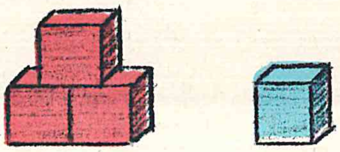
0 and 1

1 and 1

1 and 1

1

2

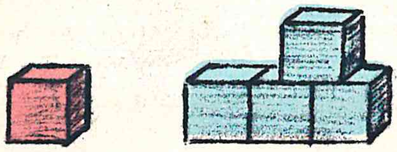


3 and 1

1 and 2

3

2 and 1



1 and 4

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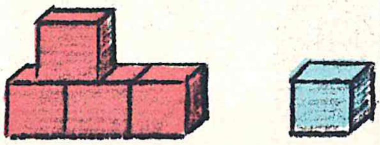

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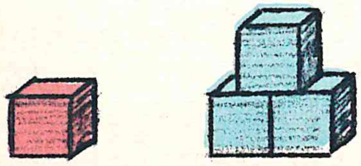

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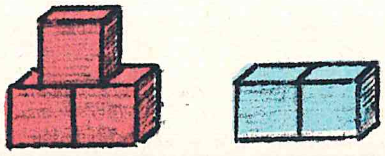

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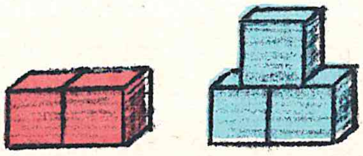

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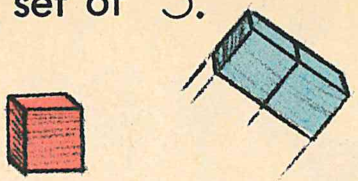

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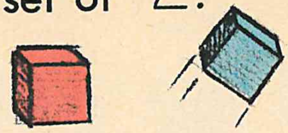

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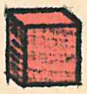
A set of 1.



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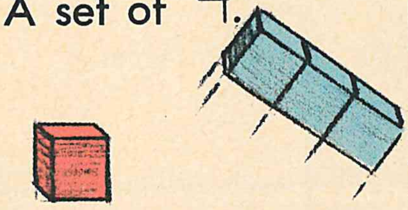
A set of 4.



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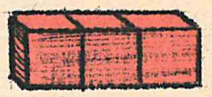

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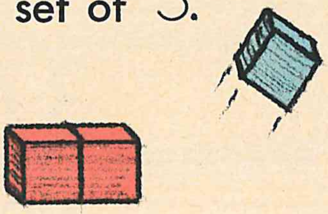
A set of 3.



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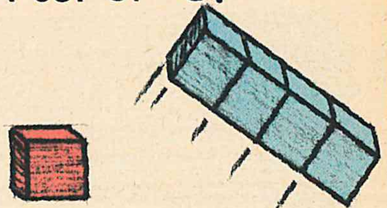
A set of 5.



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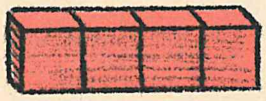
A set of 4.



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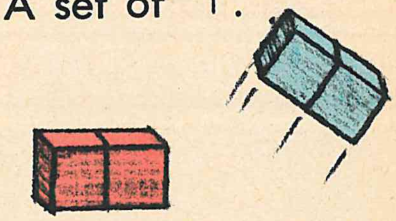
A set of 4.



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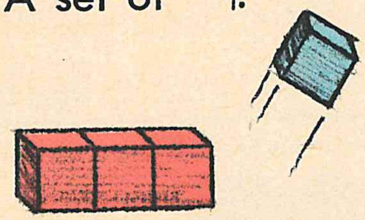
A set of 4.



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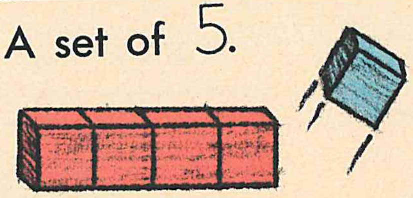

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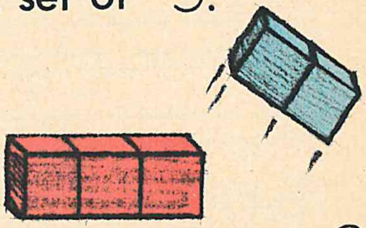

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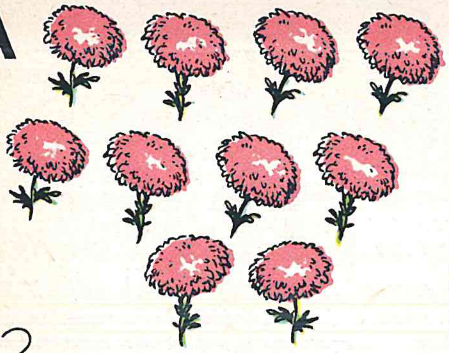

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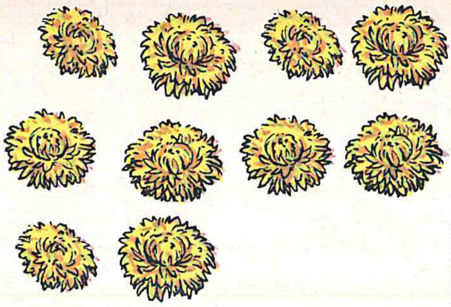

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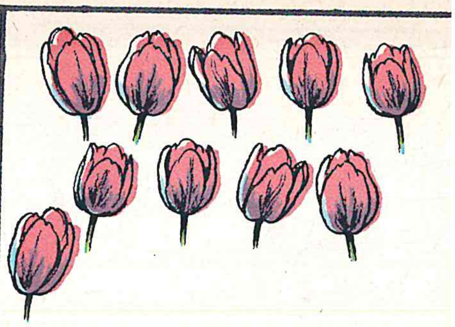

10 ____

B

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4 tens and 3 ones or ____

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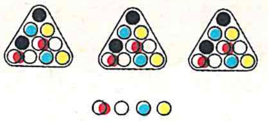

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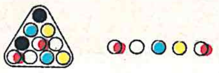

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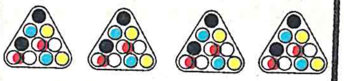

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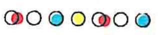

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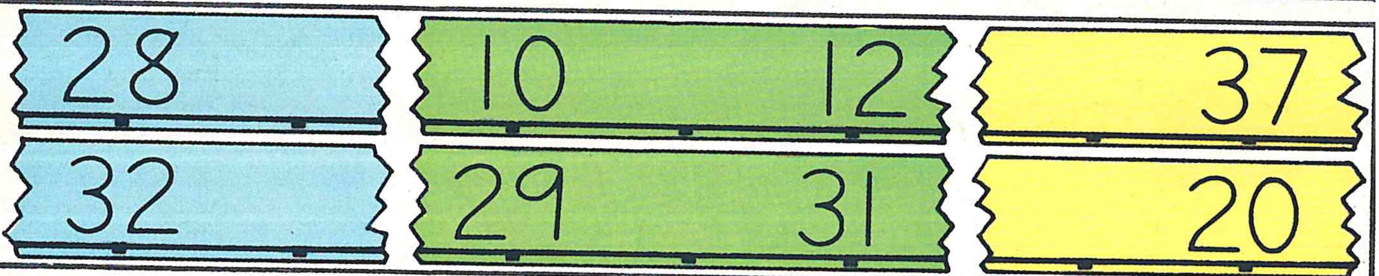

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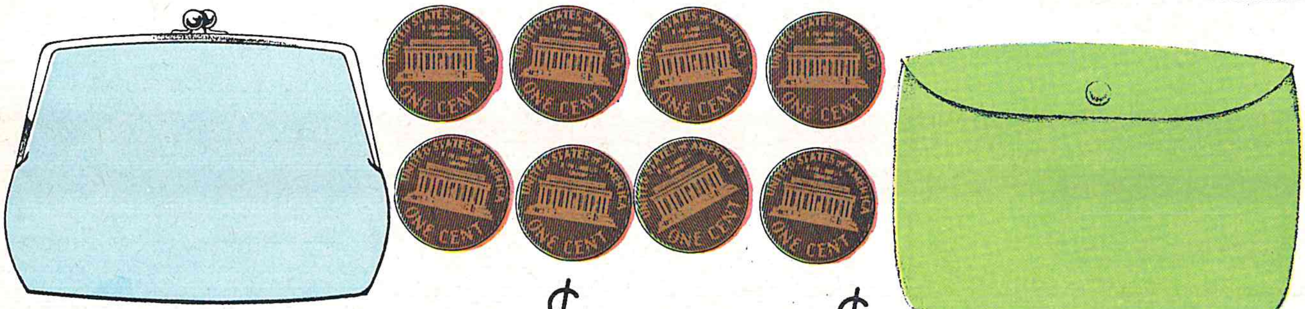

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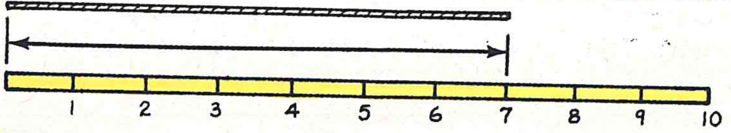

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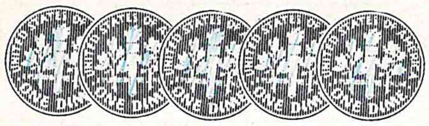

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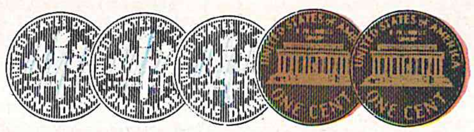

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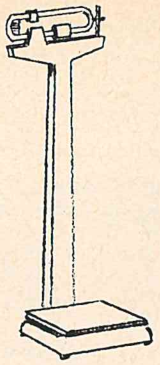

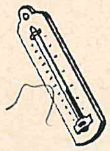

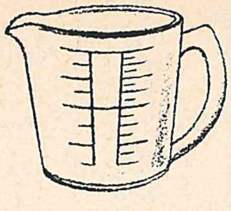

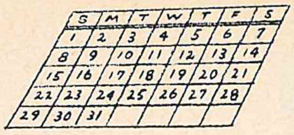

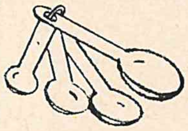

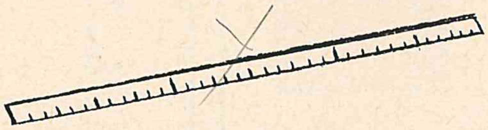

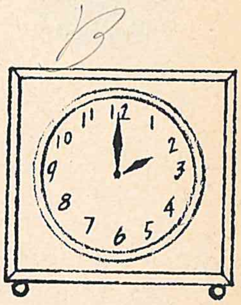

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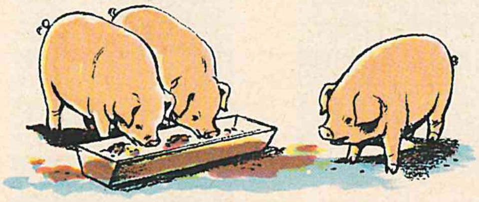

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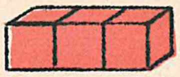

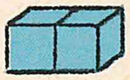

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A set of ____.

4 and 1

A set of ____.

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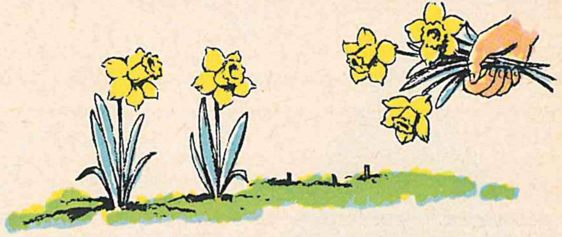

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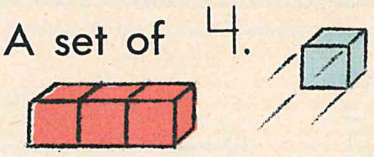

Take away 1.

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A set of 3.

Take away 2.

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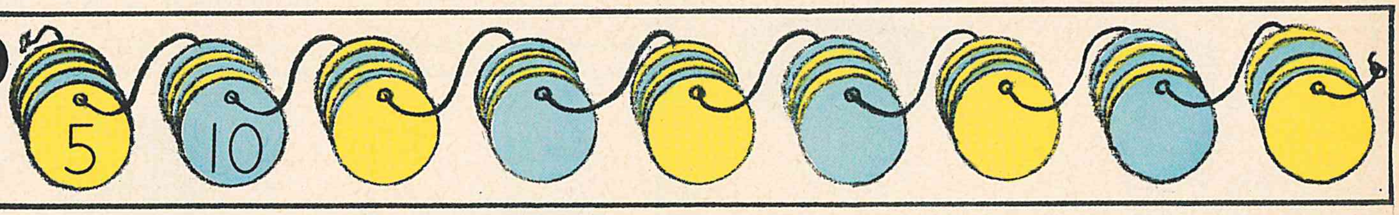

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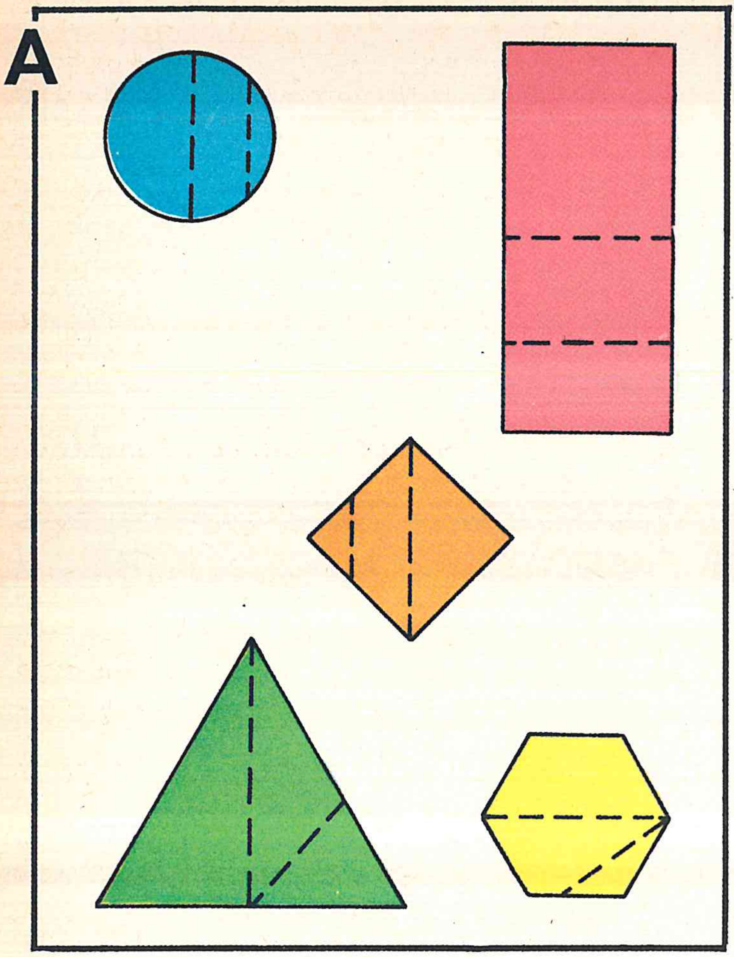
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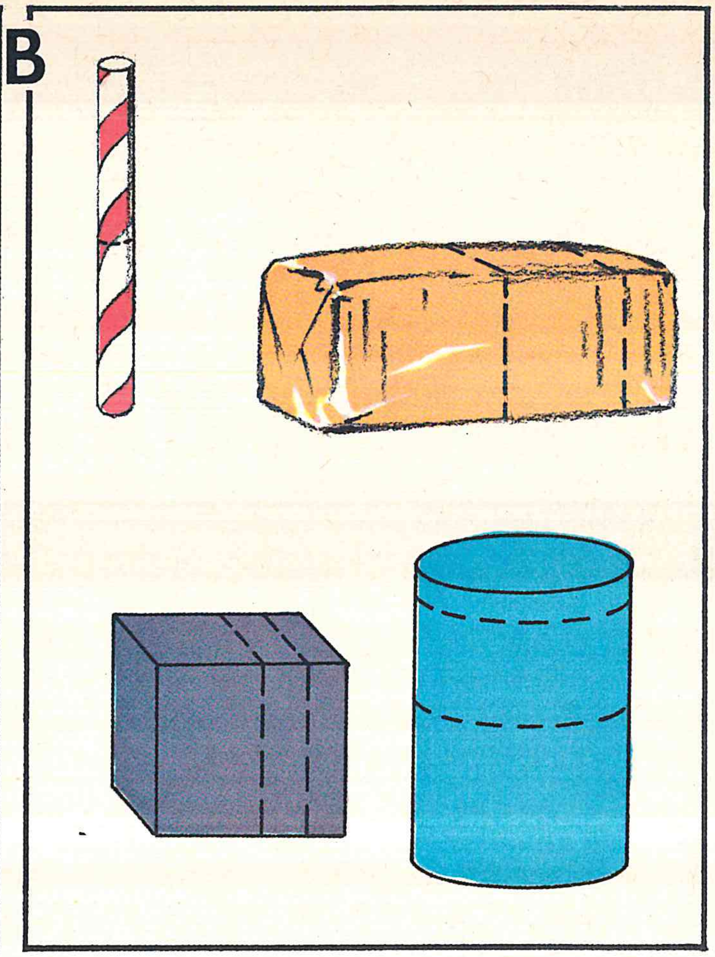
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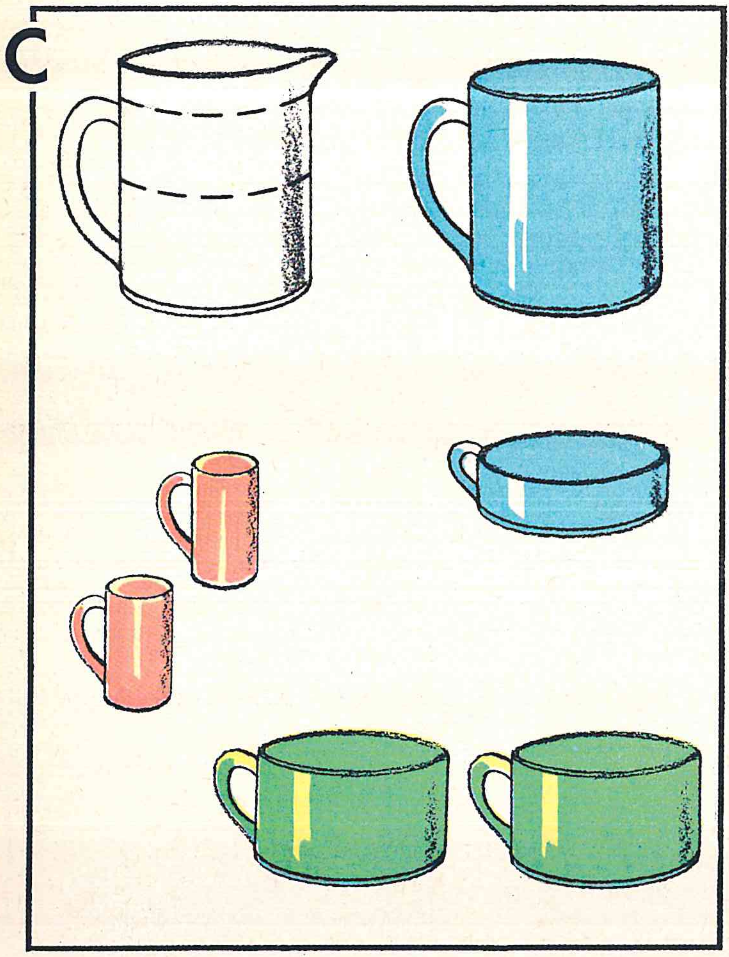
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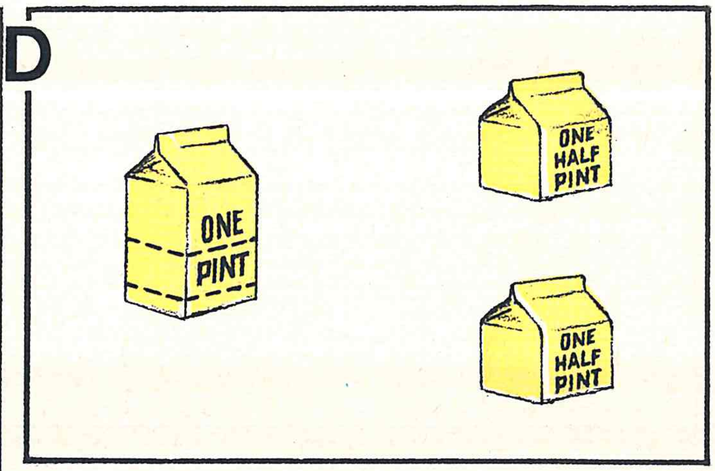
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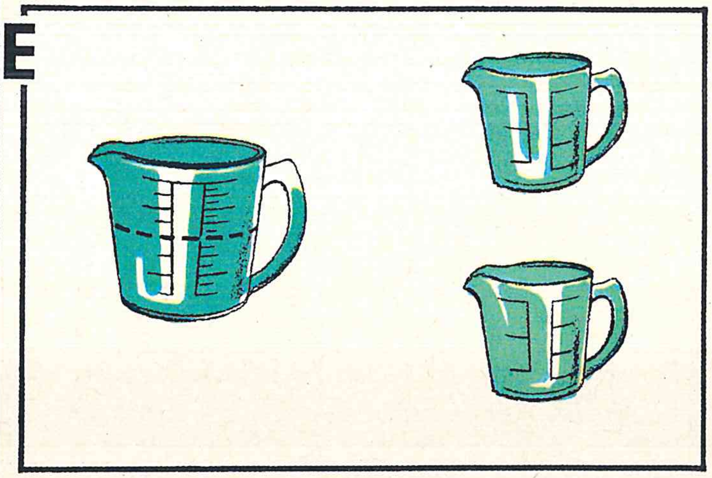
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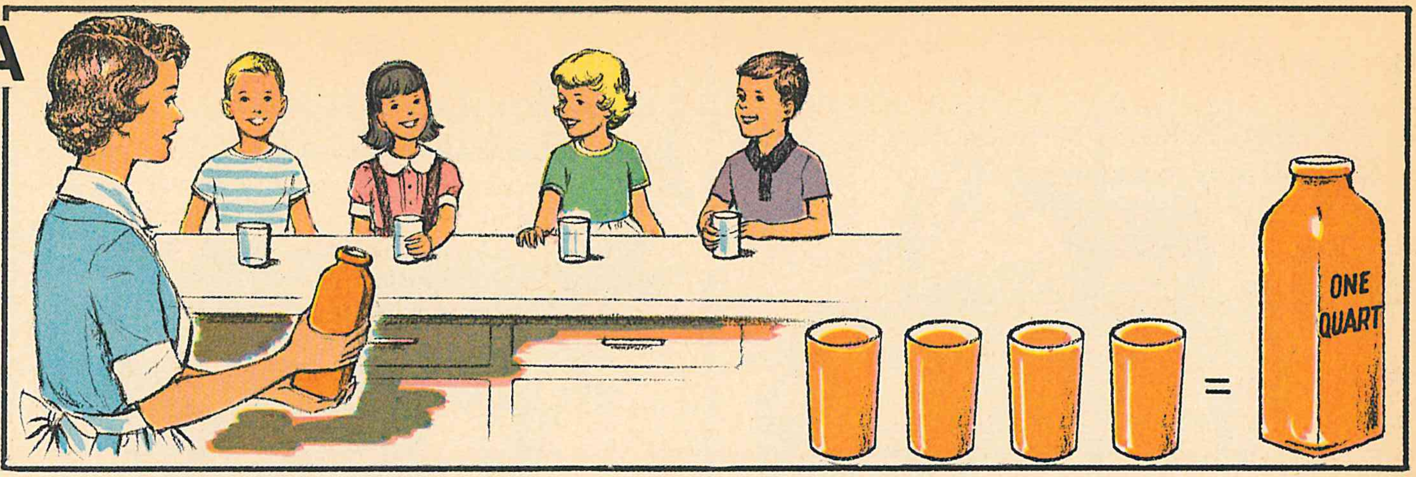

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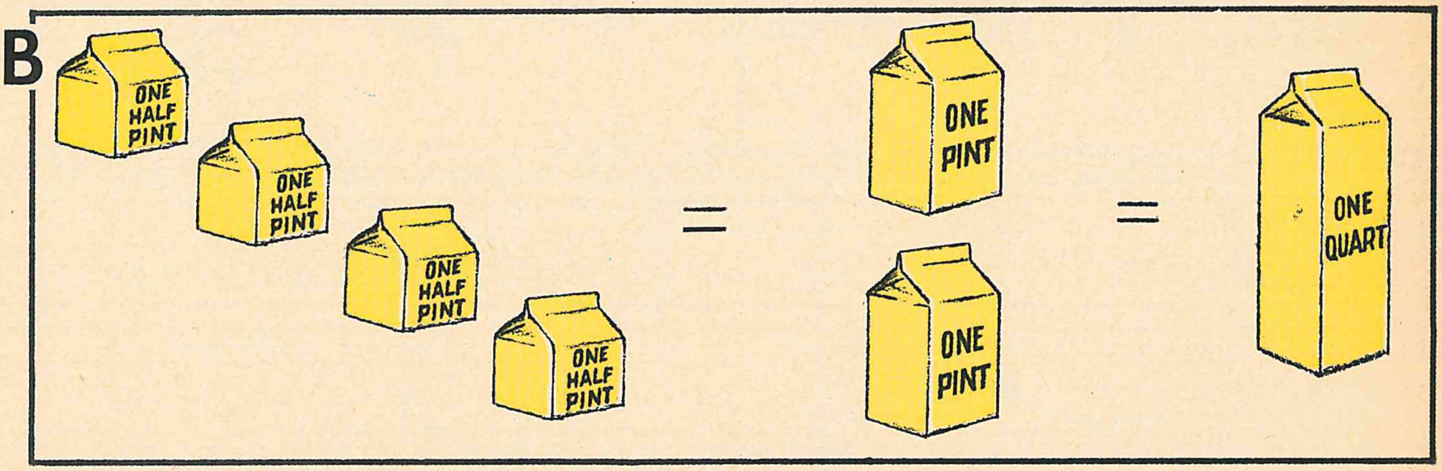

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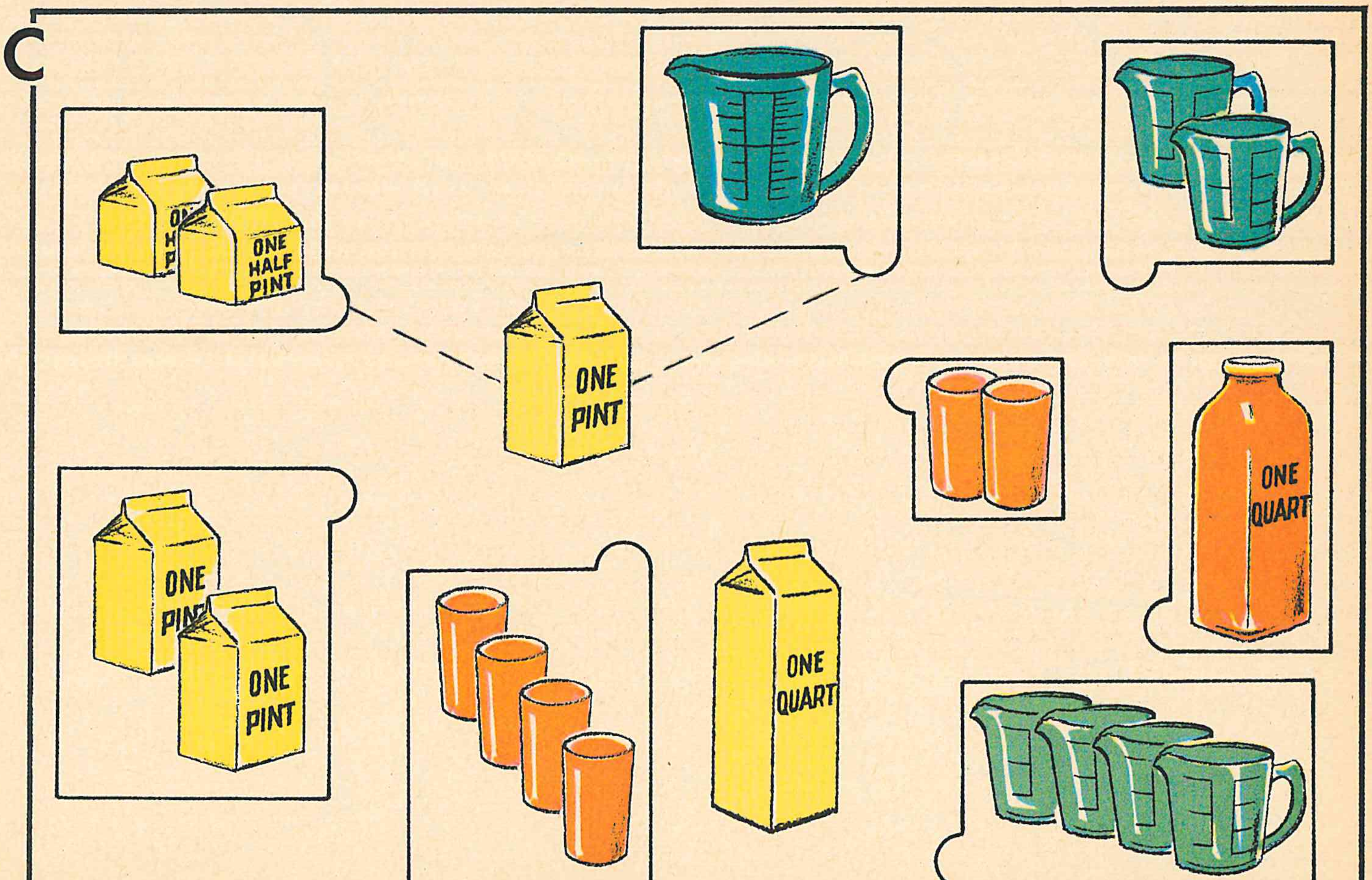

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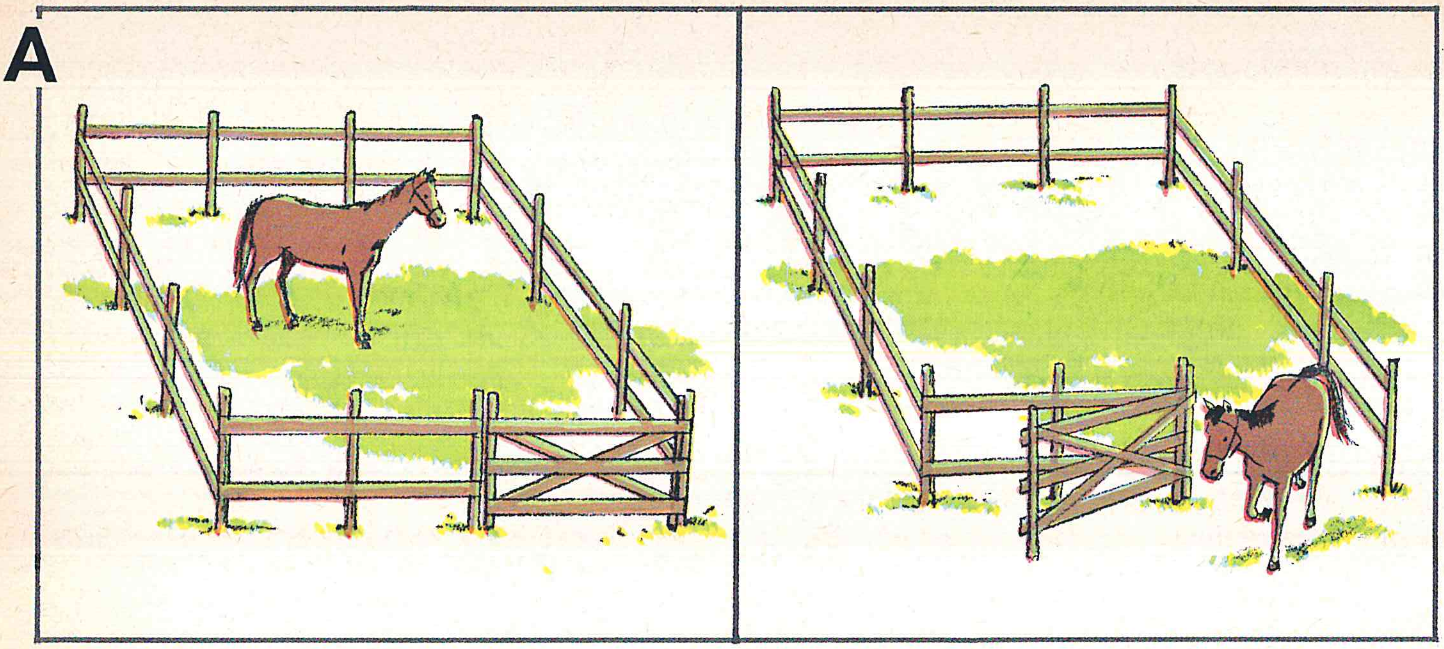

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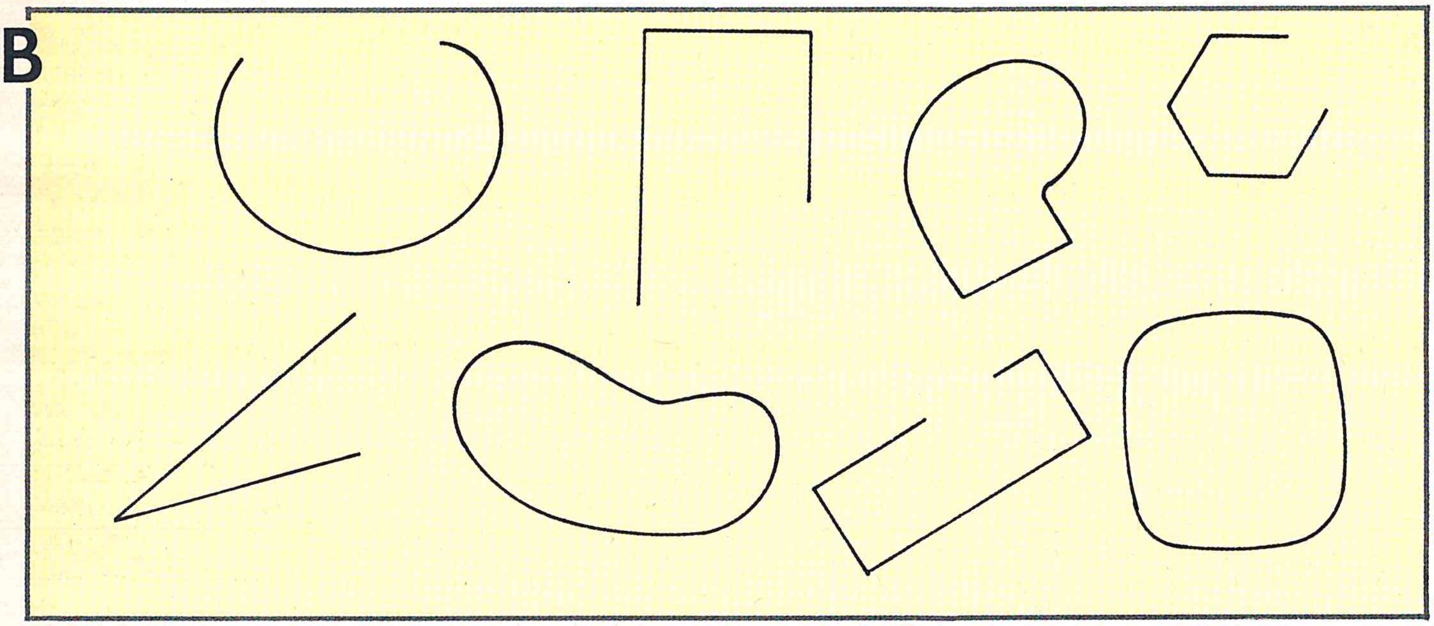

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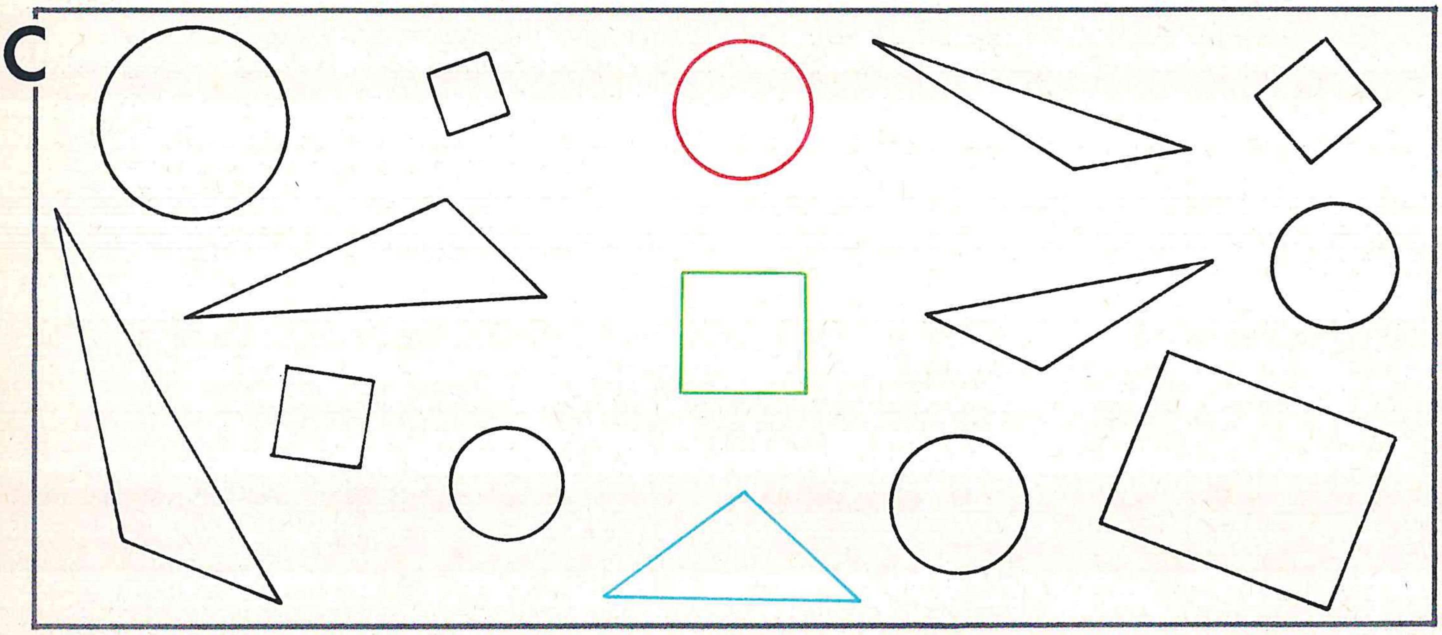

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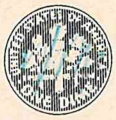
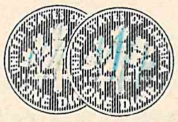
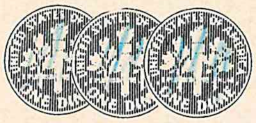
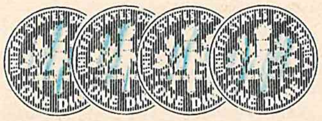
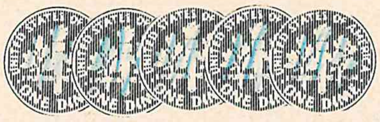
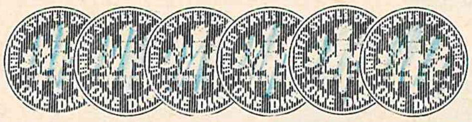
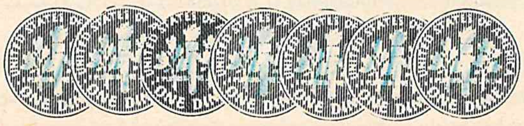
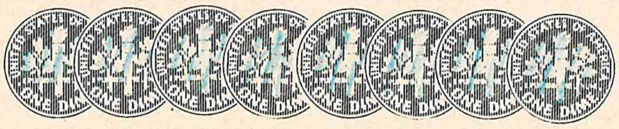
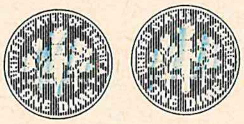
1 dime		10 ¢
____ dimes		____ ¢
____ dimes		____ ¢
____ dimes		____ ¢
____ dimes		____ ¢
____ dimes		____ ¢
____ dimes		____ ¢
____ dimes		____ ¢

B



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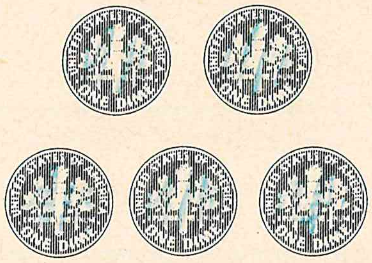

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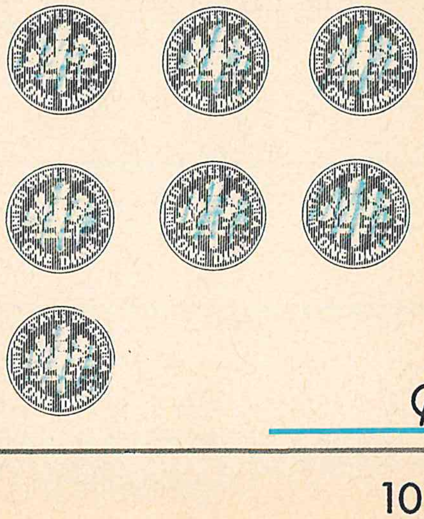

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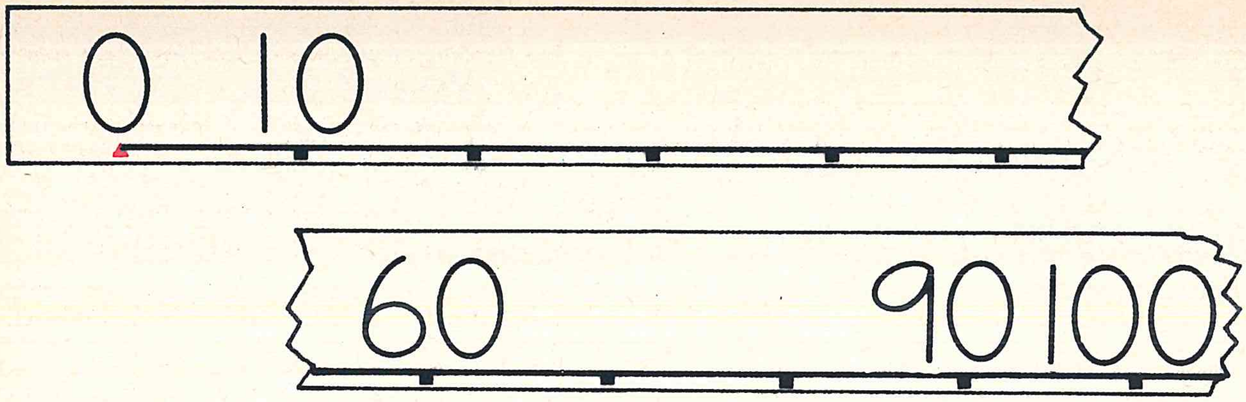
A



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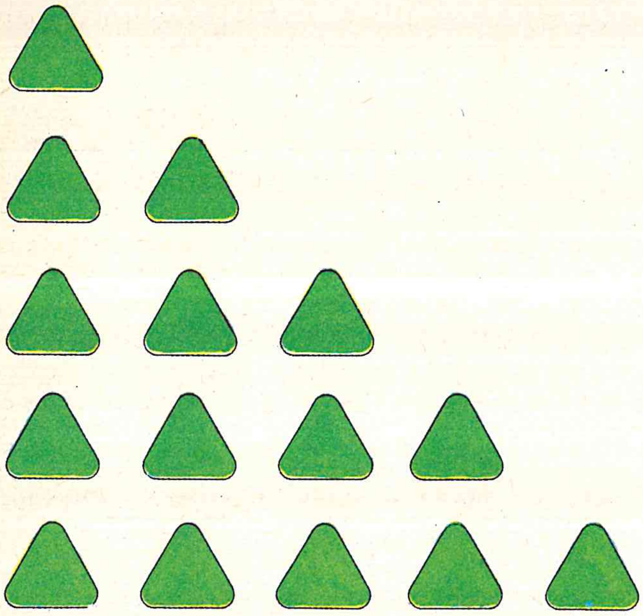

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____

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C

____ 60

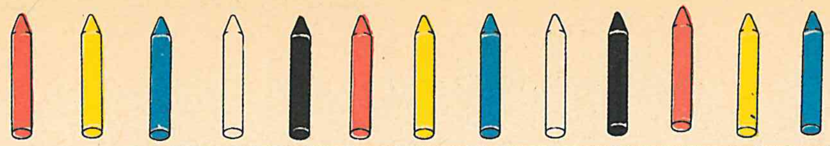
____ 70

____ 80

____ 90

____ 100

A



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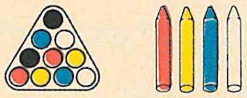
B



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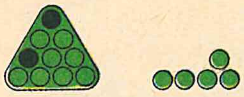

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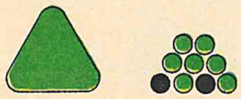


____

C

11

14

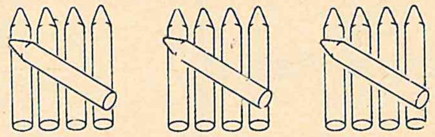
3

18

24

35

D



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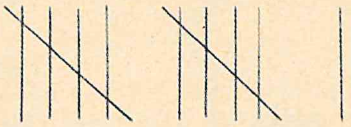

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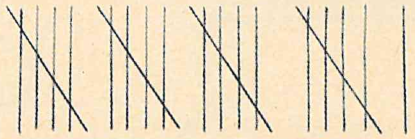


____

E

7

15

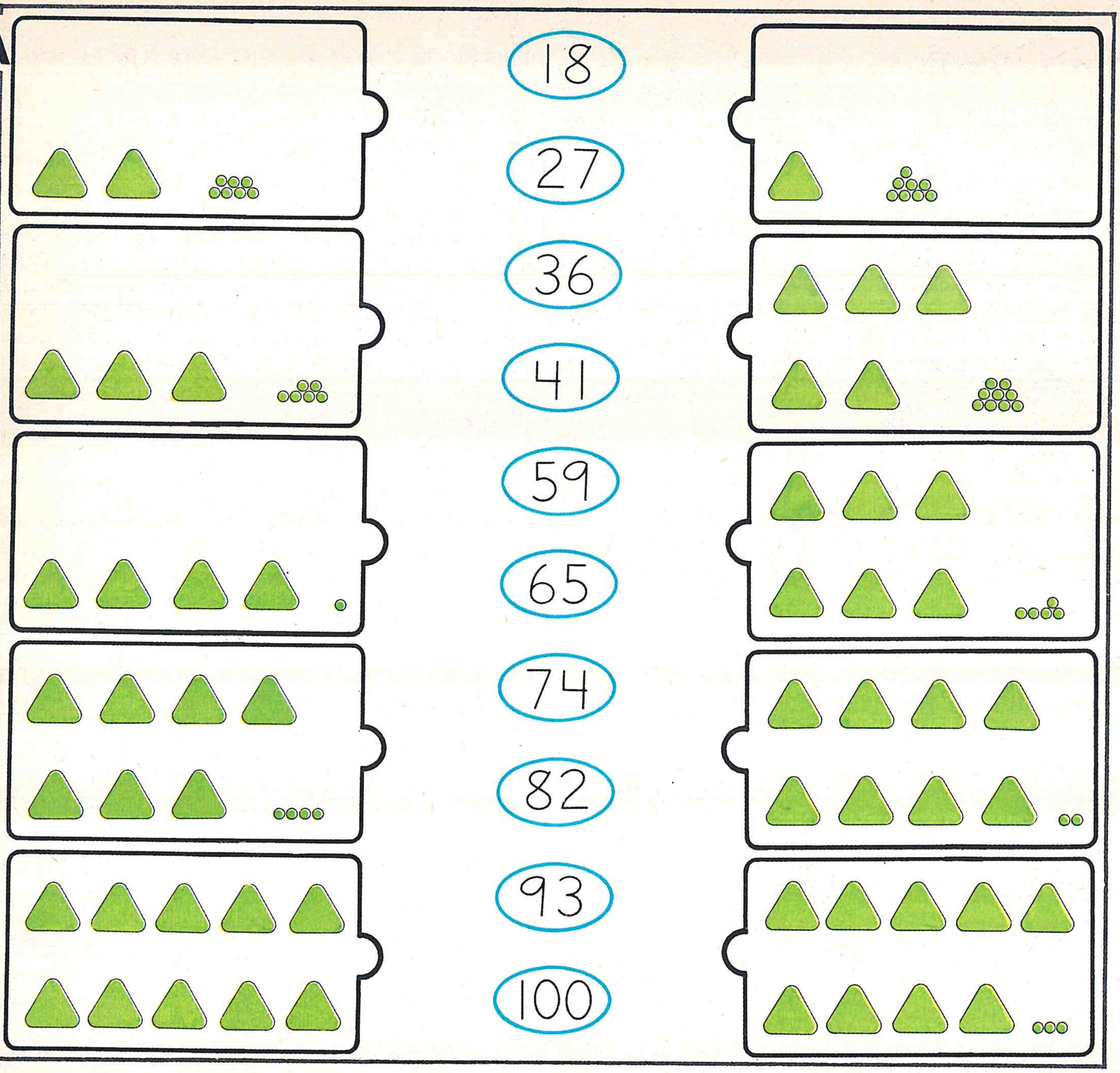
13

16

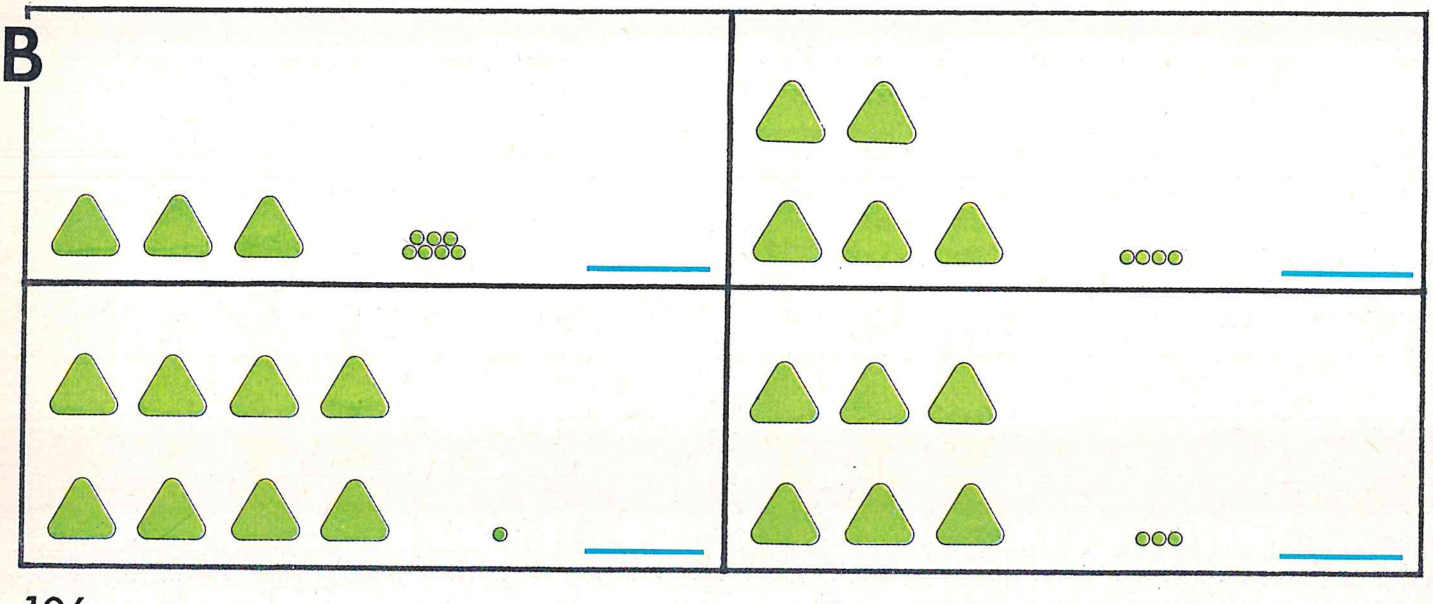
21

32

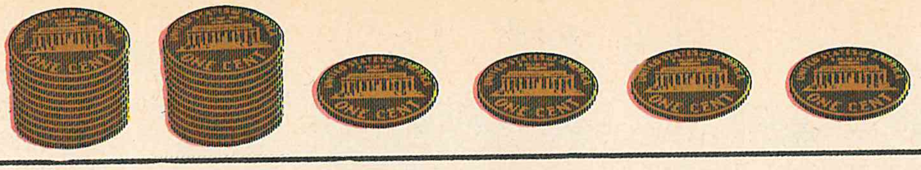
A



B



A



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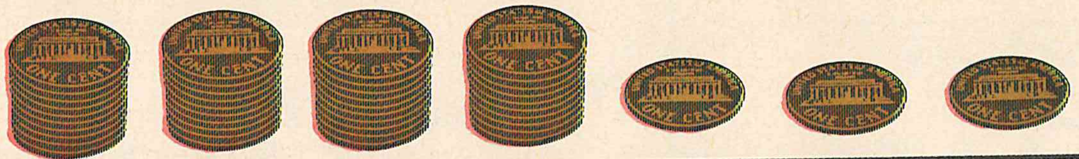

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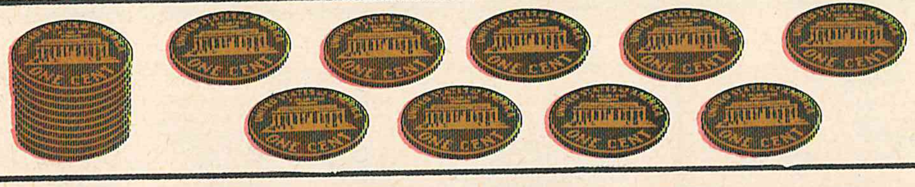

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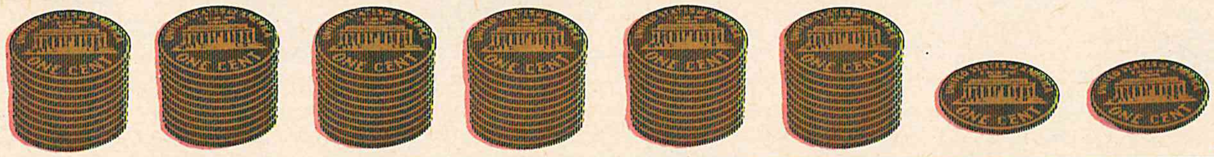

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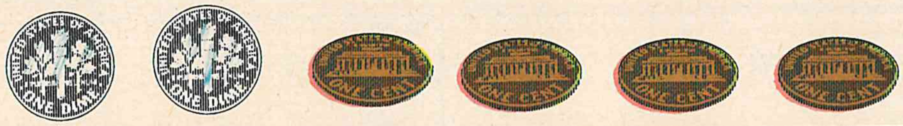
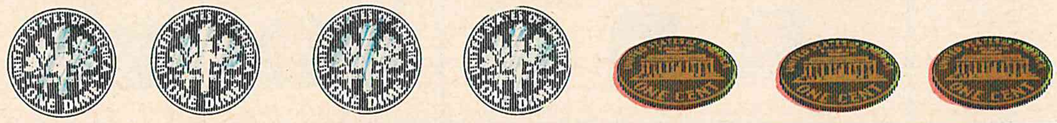
B



____¢



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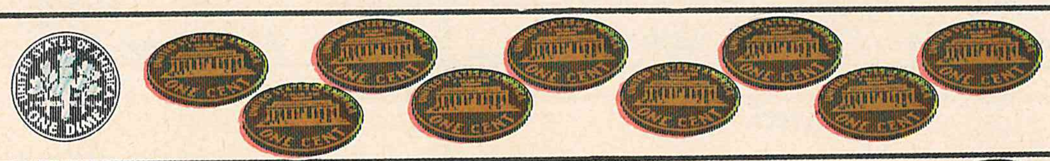

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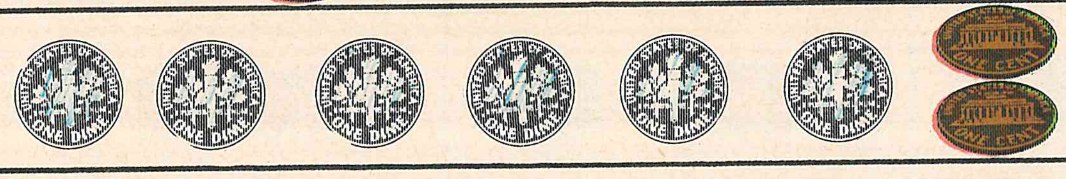
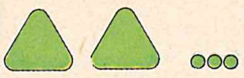


____¢

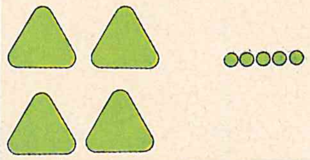
C

20 and 3



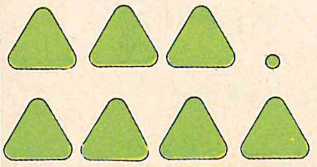
A set of ____

40 and 5



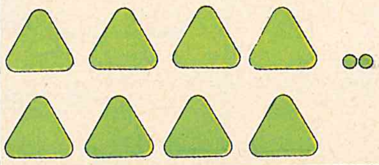
A set of ____

70 and 1



A set of ____

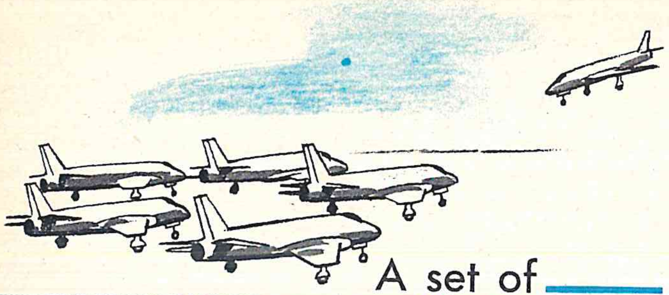
80 and 2



A set of ____

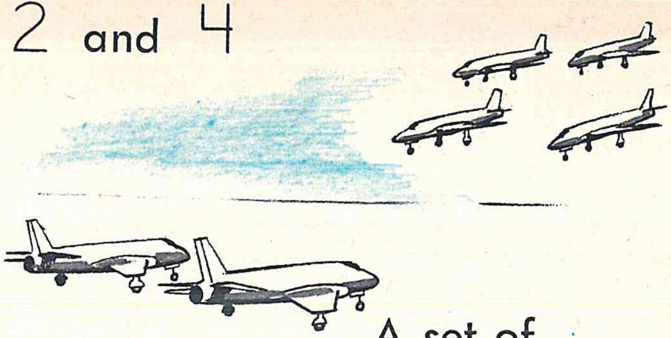
A

5 and 1



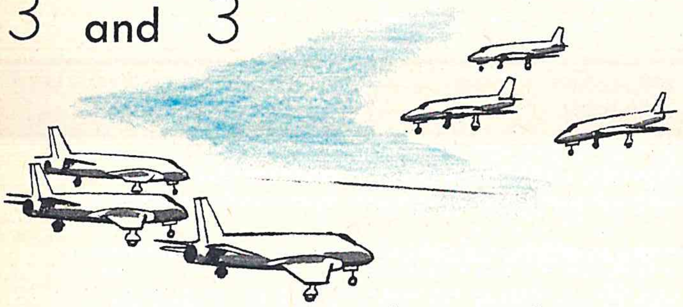
A set of ___.

2 and 4



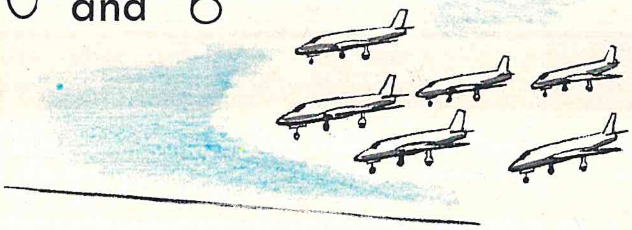
A set of ___.

3 and 3



A set of ___.

0 and 6



A set of ___.

B

0 and 1

A set of ___.

1 and 1

A set of ___.

2 and 1

A set of ___.

3 and 1

A set of ___.

4 and 1

A set of ___.

5 and 1

A set of ___.

C

4 and ___
A set of 6.

1 and ___
A set of 6.

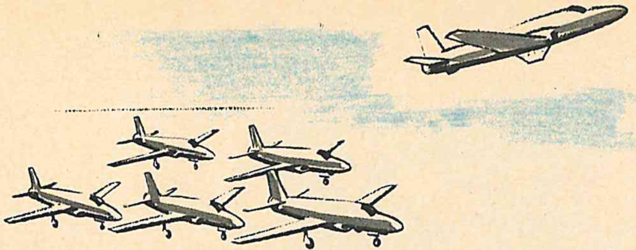
0 and ___
A set of 6.

___ and 6
A set of 6.

___ and 3
A set of 6.

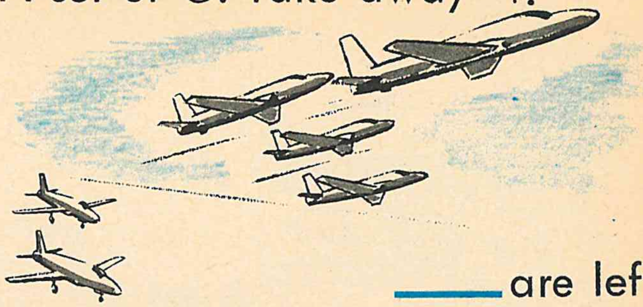
___ and 4
A set of 6.

A A set of 6. Take away 1.



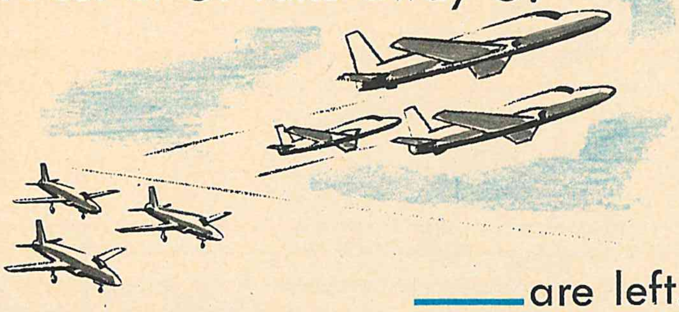
____ are left.

A set of 6. Take away 4.



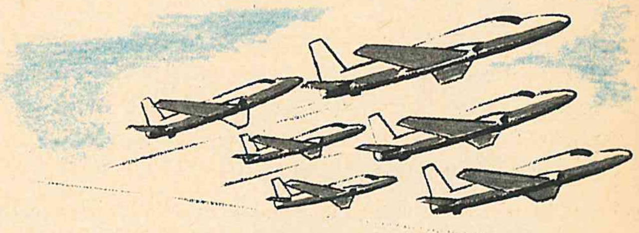
____ are left.

A set of 6. Take away 3.



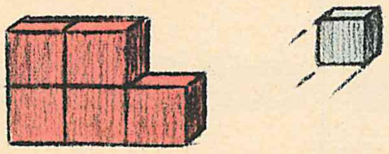
____ are left.

A set of 6. Take away 6.



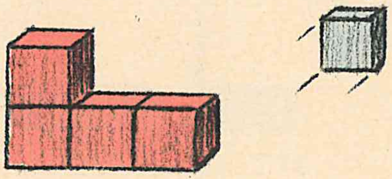
____ are left.

B From 6 take away 1.



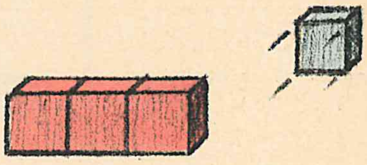
____ are left.

From 5 take away 1.



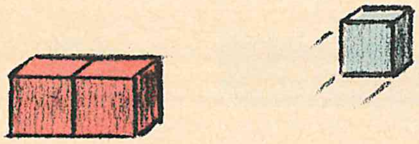
____ are left.

From 4 take away 1.



____ are left.

From 3 take away 1.

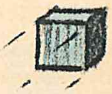


____ are left.

From 2 take away 1.

____ is left.

From 1 take away 1.



____ are left.

C From 6 take away 5.

____ is left.

From 6 take away 2.

____ are left.

From 6 take away 0.

____ are left.

From 6 take away ____.

5 are left.

From 6 take away ____.

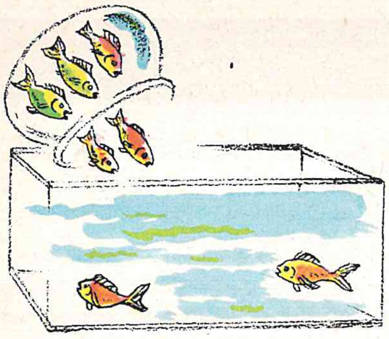
3 are left.

From 6 take away ____.

0 are left.

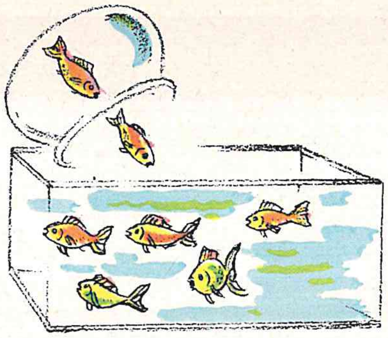
A

5 and 2



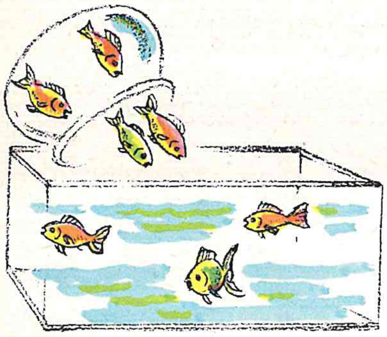
A set of ☐.

2 and 5



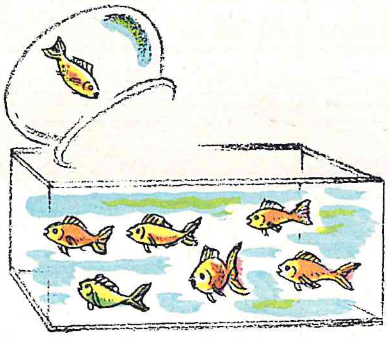
A set of ☐.

4 and 3



A set of ☐.

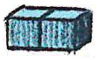
1 and 6



A set of ☐.

B

0 and 2

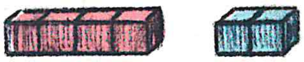


A set of ☐.

2 and 2

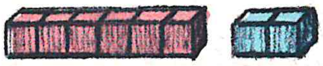
A set of ☐.

4 and 2



A set of ☐.

6 and 2



A set of ☐.

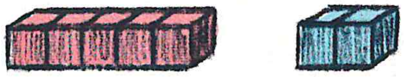
1 and 2

A set of ☐.

3 and 2

A set of ☐.

5 and 2



A set of ☐.

C

6 and ☐

A set of 7.

3 and ☐

A set of 7.

7 and ☐

A set of 7.

☐ and 3

A set of 7.

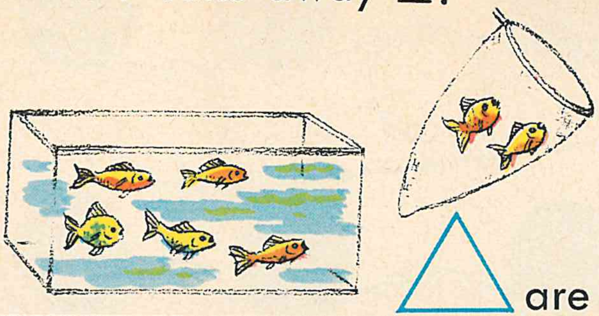
☐ and 7

A set of 7.

☐ and 6

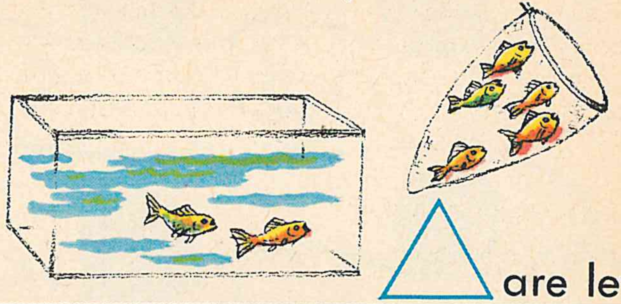
A set of 7.

A From 7 take away 2.



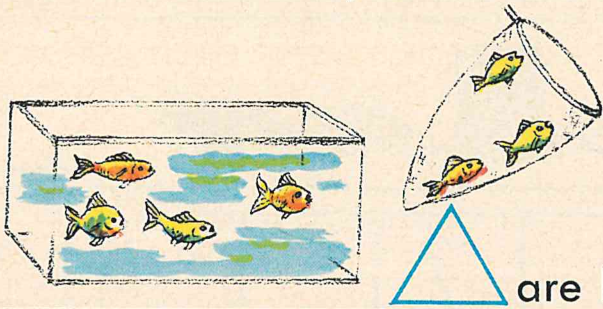
△ are left.

From 7 take away 5.



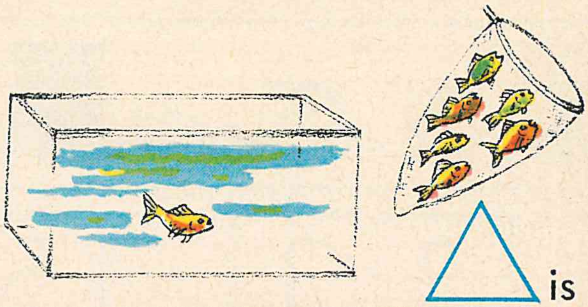
△ are left.

From 7 take away 3.



△ are left.

From 7 take away 6.



△ is left.

B From 8 take away 2.

△ are left.

From 6 take away 2.

△ are left.

From 4 take away 2.

△ are left.

From 2 take away 2.

△ are left.

From 7 take away 2.

△ are left.

From 5 take away 2.

△ are left.

From 3 take away 2.

△ is left.

C From 7 take 1.

△ are left.

From 7 take 4.

△ are left.

From 7 take 7.

△ are left.

From 7 take ☐.

1 is left.

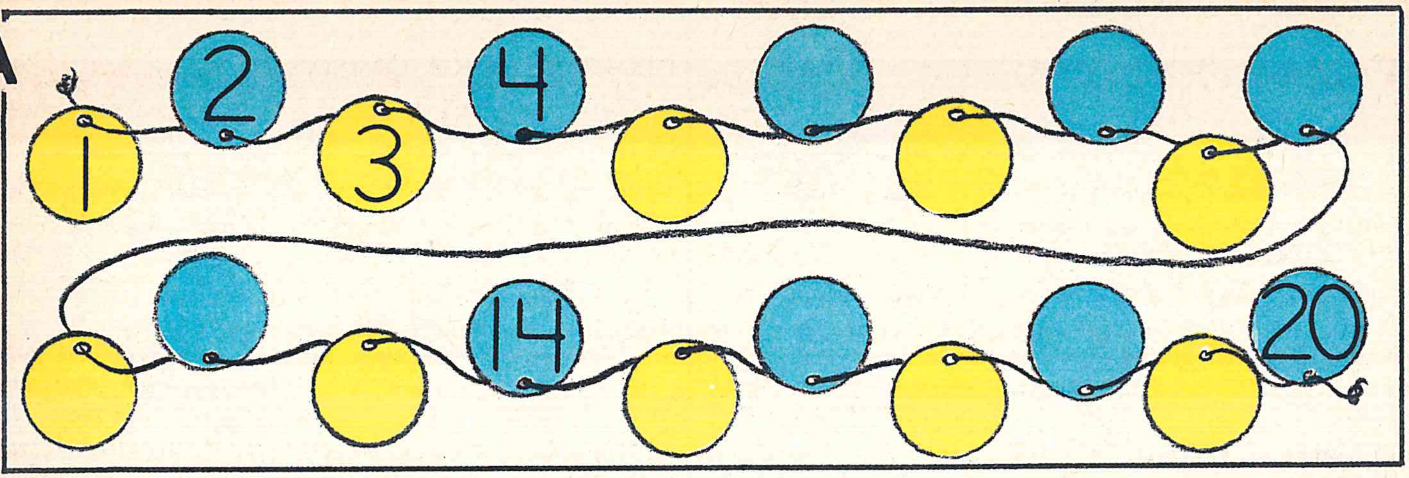
From 7 take ☐.

2 are left.

From 7 take ☐.

7 are left.

A

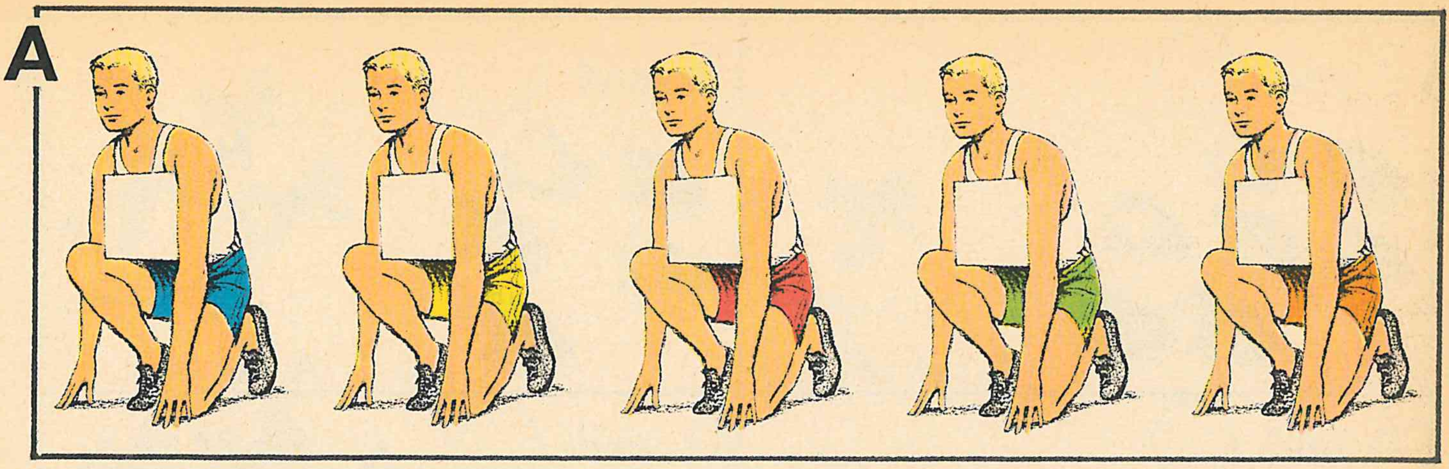


B

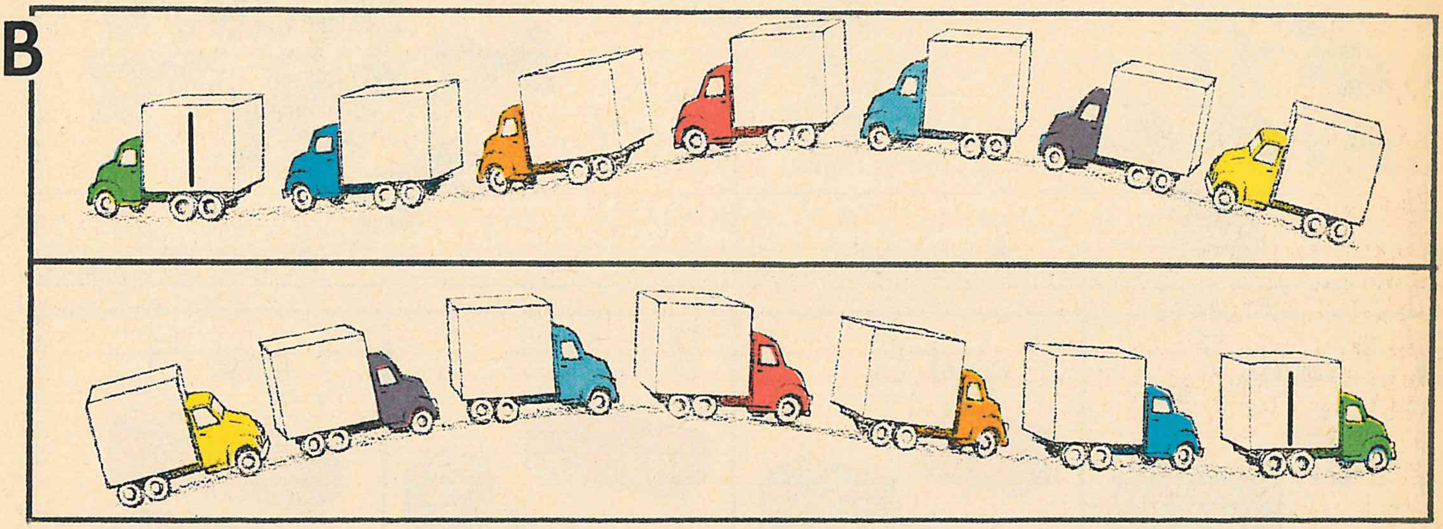
C

1	2	3		5		7			10
11		13			16		18		20
	22		24			27		29	
31				35			38		40
	42				46	47		49	
51			54				58		60
		63		65		67			70
	72			75	76			79	
81		83				87	88		
	92		94		96				

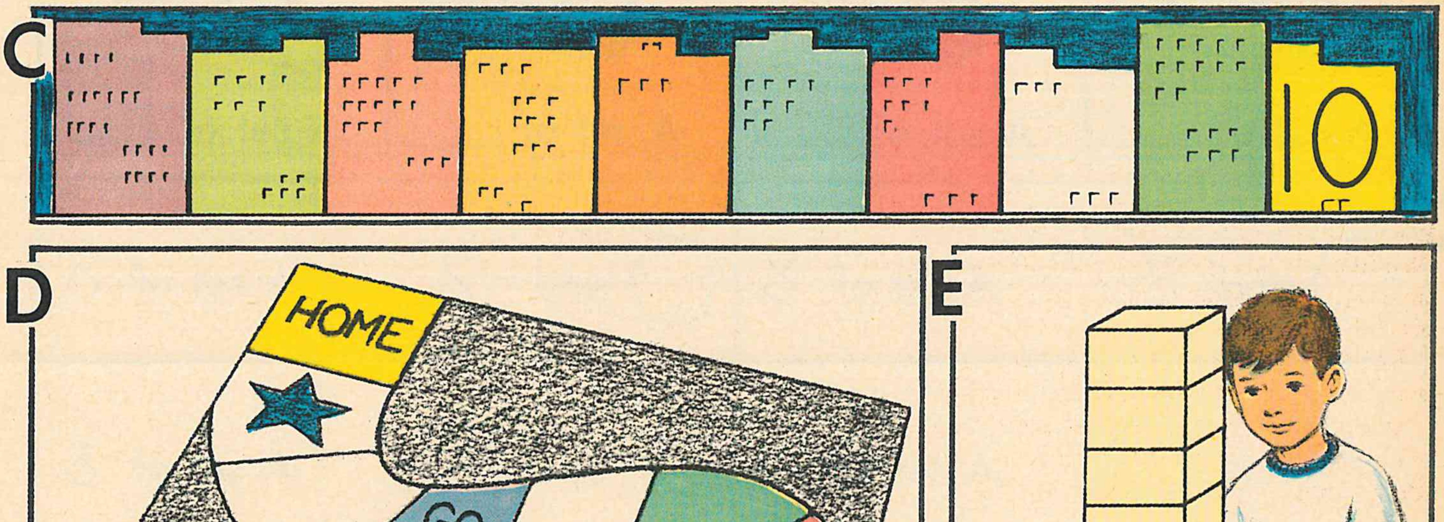
A



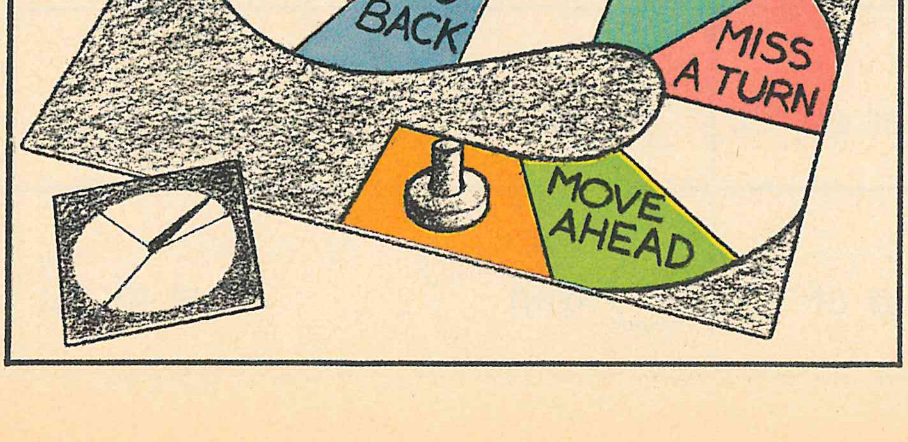
B



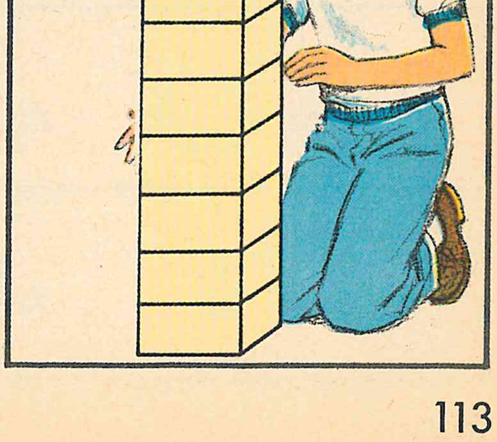
C



D

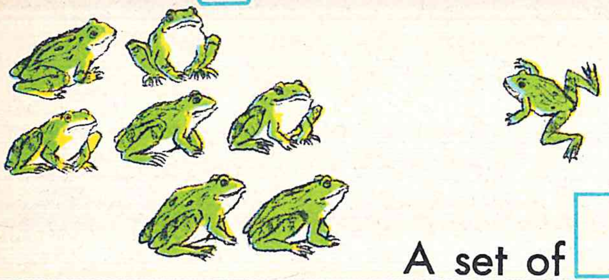


E



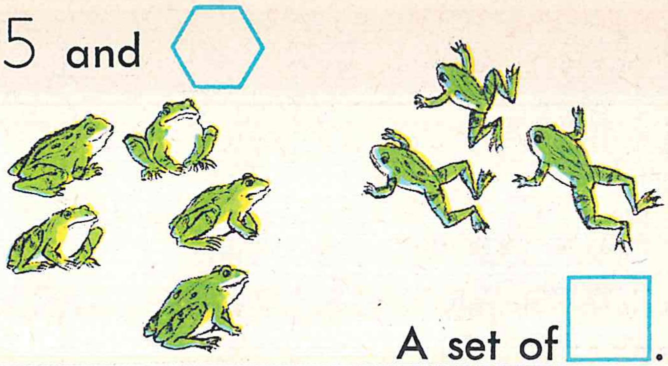
A

7 and ⬡



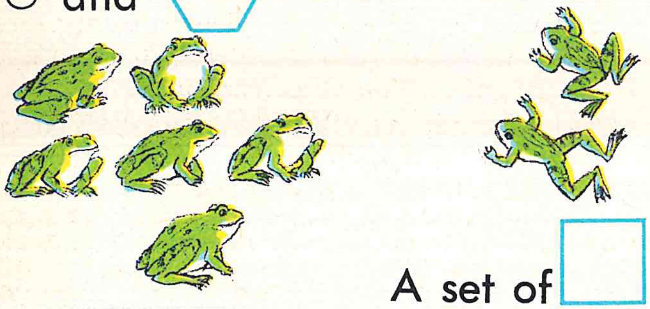
A set of ☐.

5 and ⬡



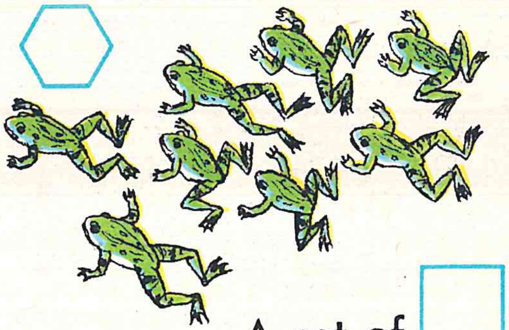
A set of ☐.

6 and ⬡



A set of ☐.

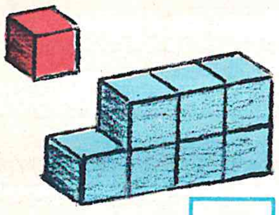
0 and ⬡



A set of ☐.

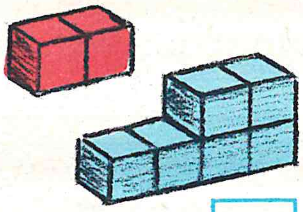
B

1 and 7



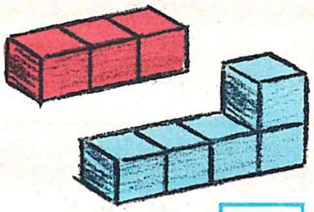
A set of ☐.

2 and 6



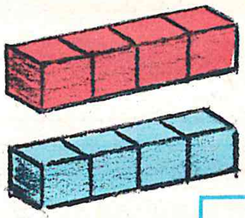
A set of ☐.

3 and 5



A set of ☐.

4 and 4



A set of ☐.

C

⬡ and 3. A set of 8.

⬡ and 2. A set of 8.

4 and ⬡. A set of 8.

1 and ⬡. A set of 8.

8 and ⬡. A set of 8.

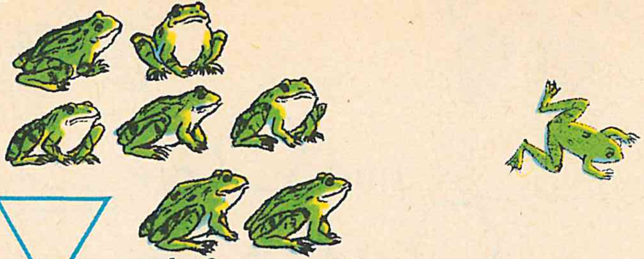
3 and ⬡. A set of 8.

⬡ and 6. A set of 8.

⬡ and 4. A set of 8.

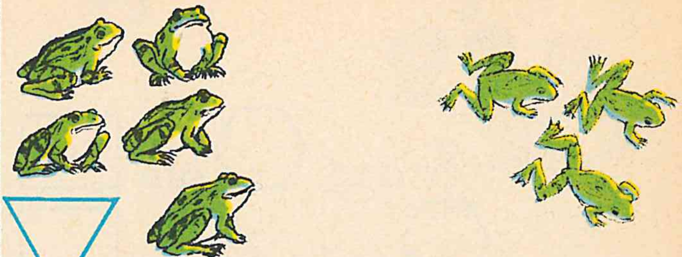
A

From a set of 8 take 1.



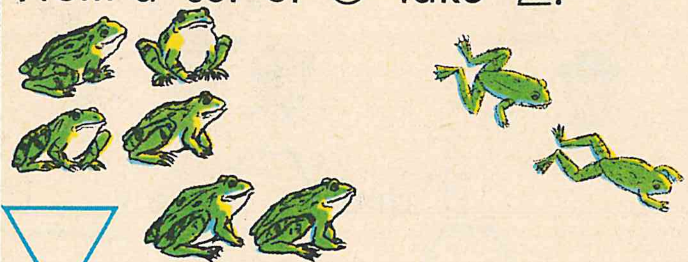
▽ are left.

From a set of 8 take 3.



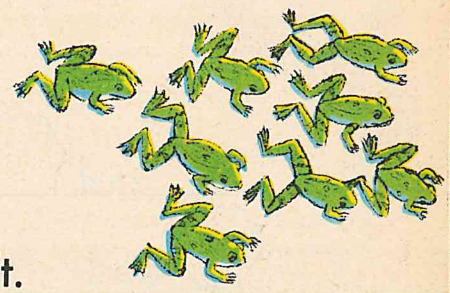
▽ are left.

From a set of 8 take 2.



▽ are left.

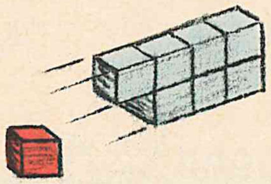
From a set of 8 take 8.



▽ are left.

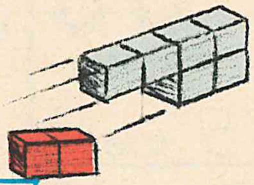
B

From 8 take 7.



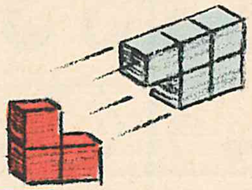
▽ is left.

From 8 take 6.



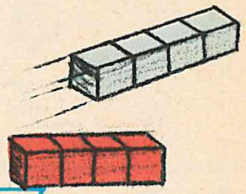
▽ are left.

From 8 take 5.



▽ are left.

From 8 take 4.



▽ are left.

C

From 8 take 5. ▽ are left.

From 8 take ▽. 6 are left.

From 8 take 4. ▽ are left.

From 8 take ▽. 7 are left.

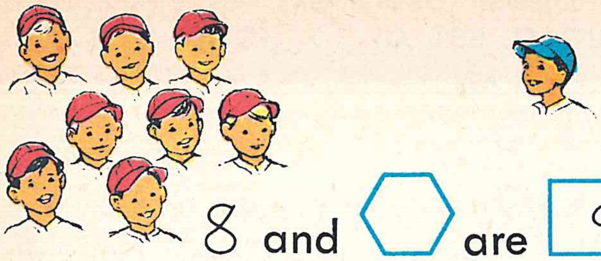
From 8 take 3. ▽ are left.

From 8 take ▽. 2 are left.

From 8 take 8. ▽ are left.

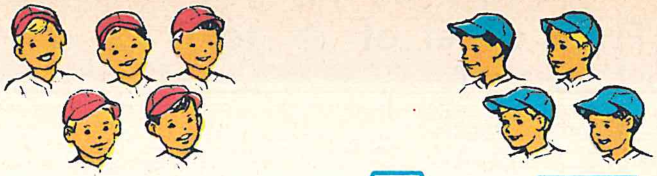
From 8 take ▽. 8 are left.

A



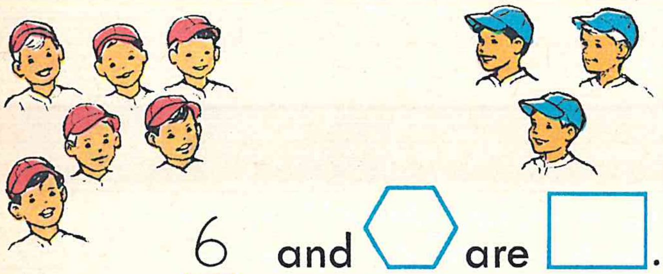
8 and ⬡ are 9.

⬡ and 8 are □.



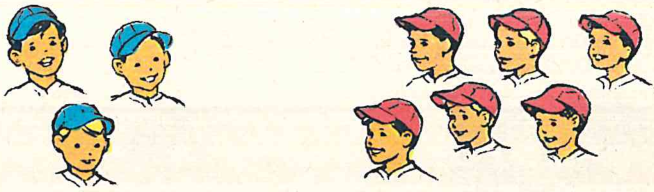
5 and ⬡ are □.

⬡ and 5 are □.



6 and ⬡ are □.

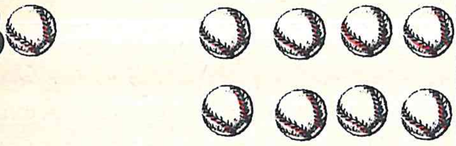
⬡ and 6 are □.



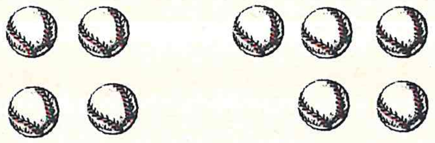
3 and ⬡ are □.

⬡ and 3 are □.

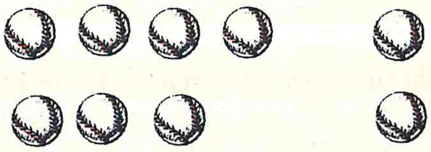
B



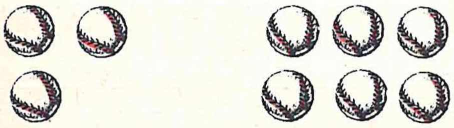
1 and ⬡ are 9.



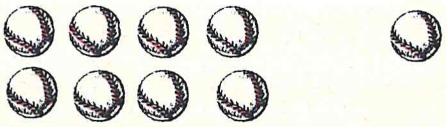
⬡ and 5 are 9.



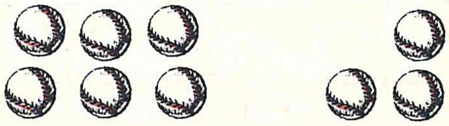
7 and ⬡ are 9.



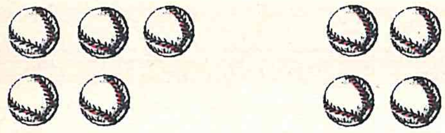
3 and ⬡ are 9.



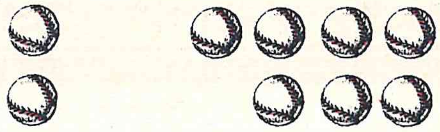
8 and ⬡ are 9.



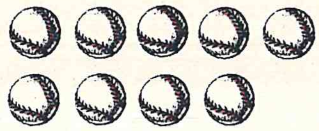
⬡ and 3 are 9.



⬡ and 4 are 9.



⬡ and 7 are 9.



⬡ and 0 are 9.

C

⬡ and 8 are 9.

⬡ and 2 are 9.

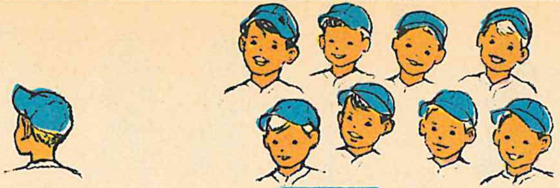
6 and ⬡ are 9.

4 and ⬡ are 9.

⬡ and 1 are 9.

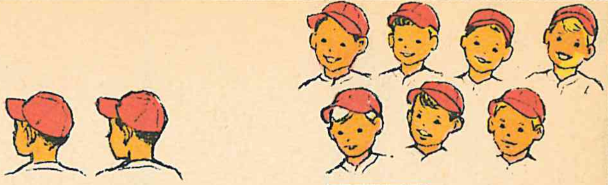
⬡ and 9 are 9.

A



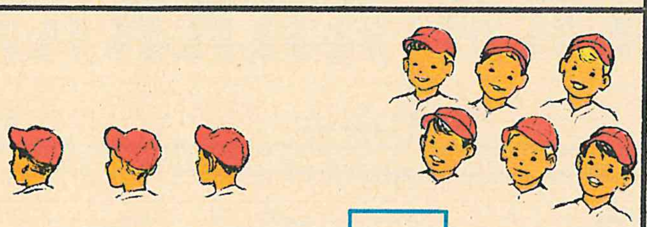
From 9 take 1. ☐ are left.

From 9 take 8. ☐ is left.



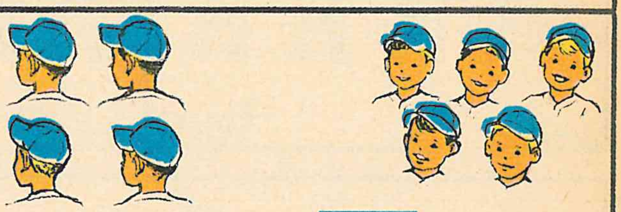
From 9 take 2. ☐ are left.

From 9 take 7. ☐ are left.



From 9 take 3. ☐ are left.

From 9 take 6. ☐ are left.



From 9 take 4. ☐ are left.

From 9 take 5. ☐ are left.

B

Take away 2. ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ☐ are left.

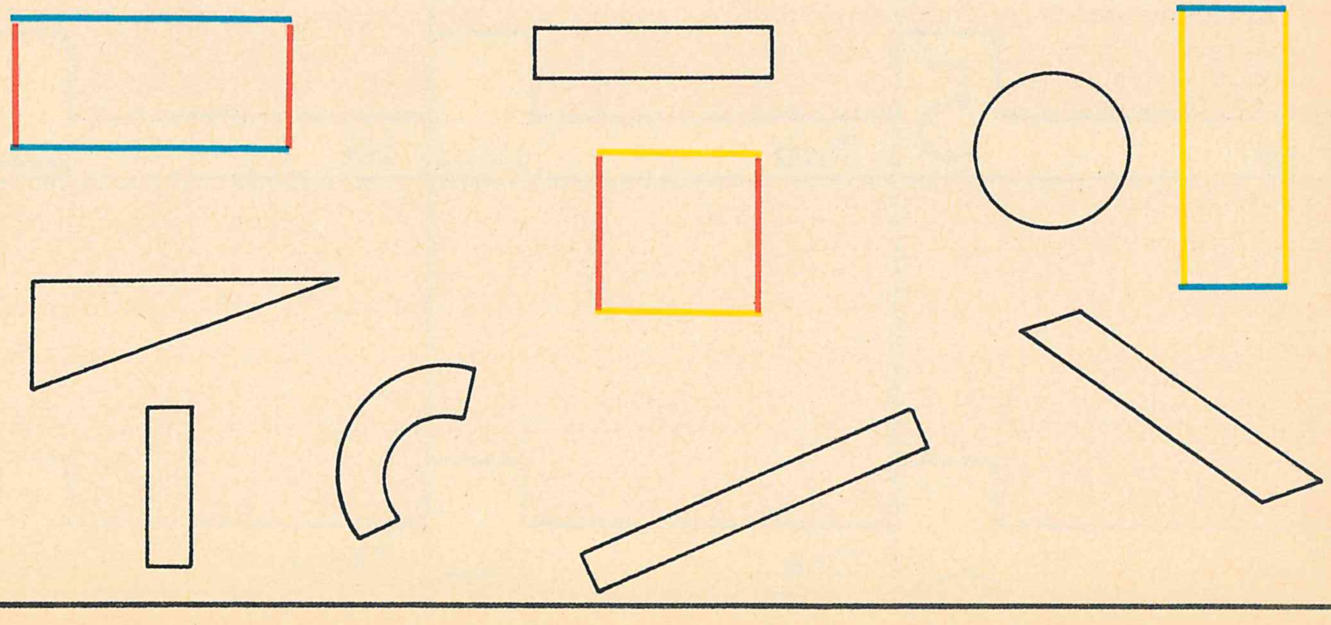
Take away 5. ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ☐ are left.

Take away 4. ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ☐ are left.

Take away 3. ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ☐ are left.

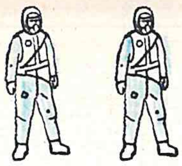
Take away 6. ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ⚾ ☐ are left.

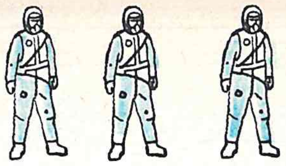
C

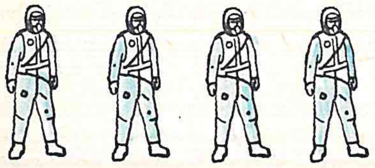


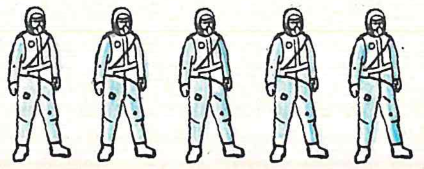
A

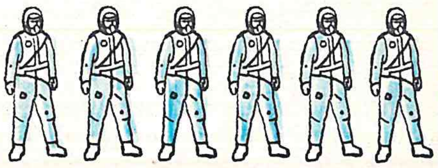
1 one


2 two

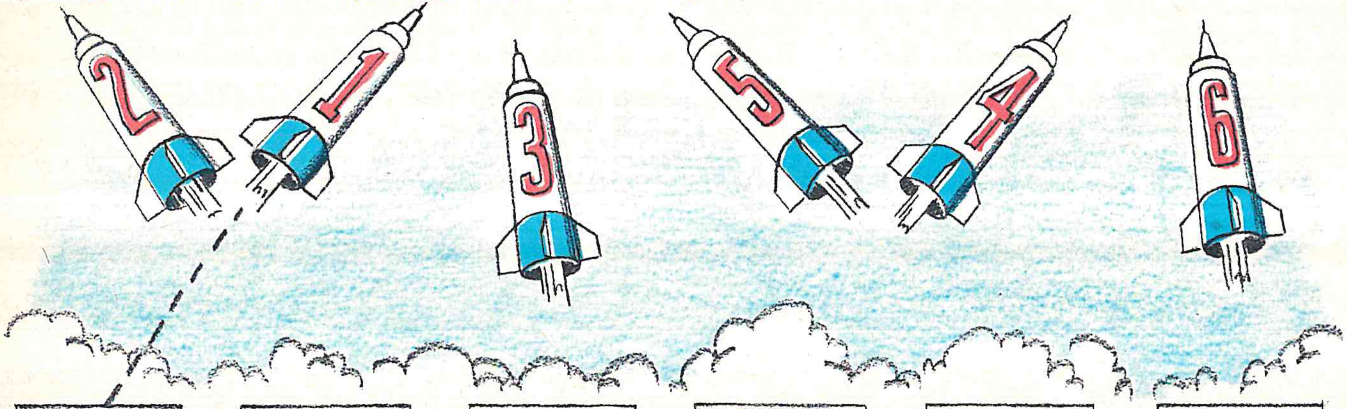

____ three


____ four


____ five

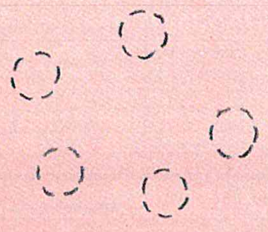

____ six

B



one two three four five six

C


Five 5

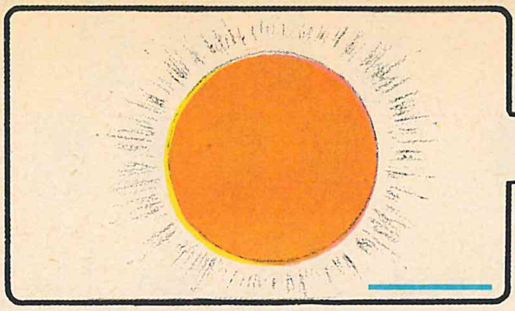
Two ____

Six ____

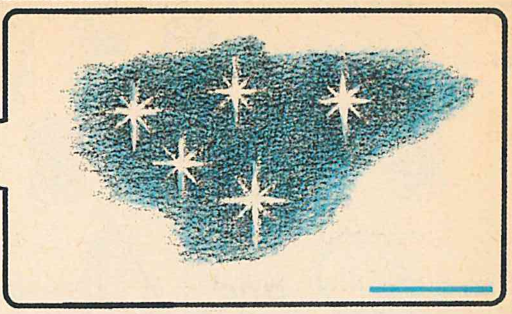
Four ____

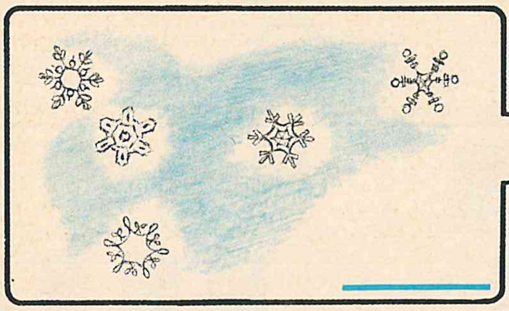
One ____

Three ____

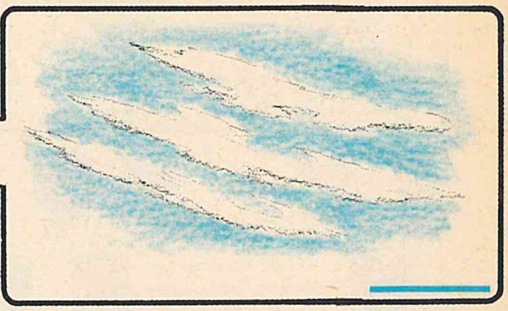


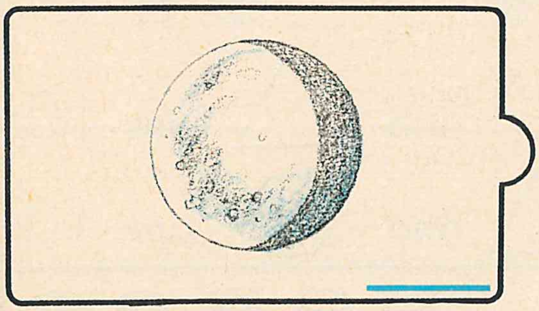
Five



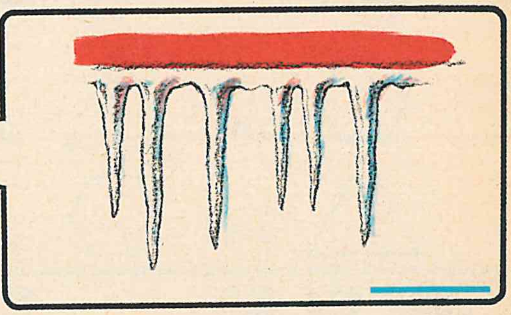


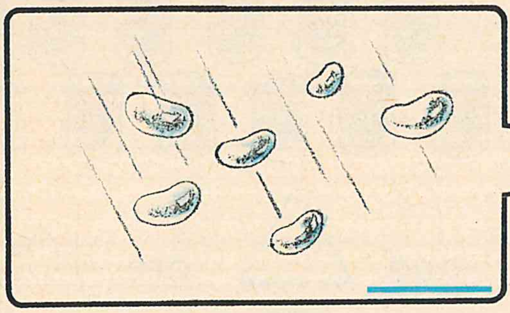
One



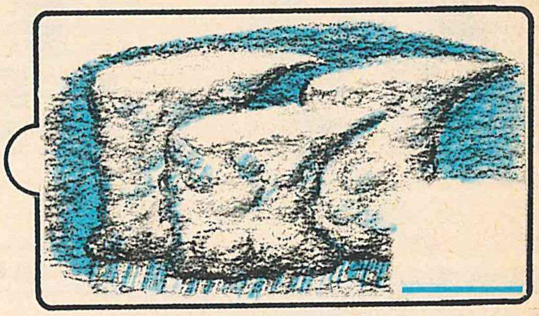


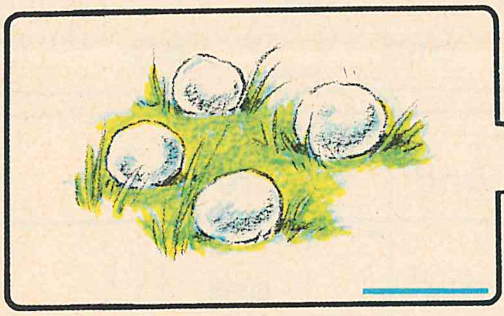
Three



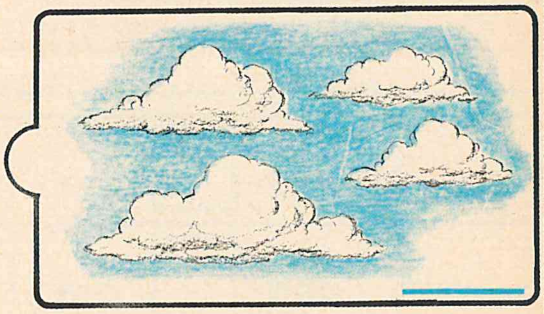


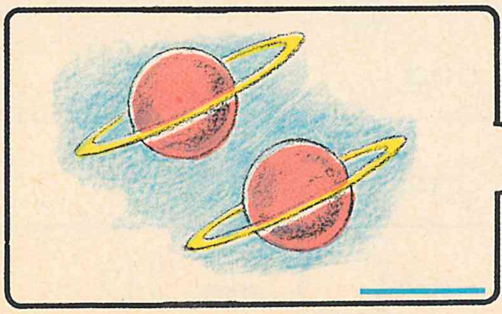
Six



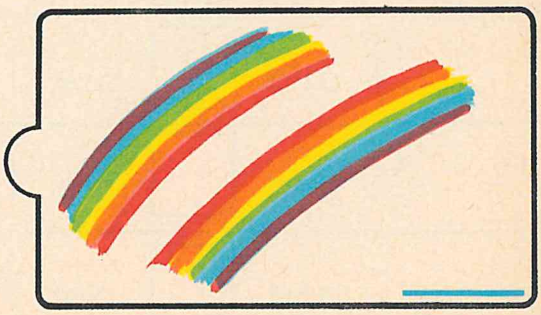


Two

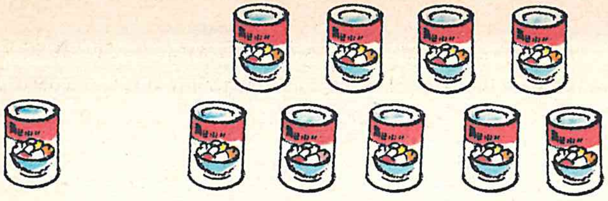




Four

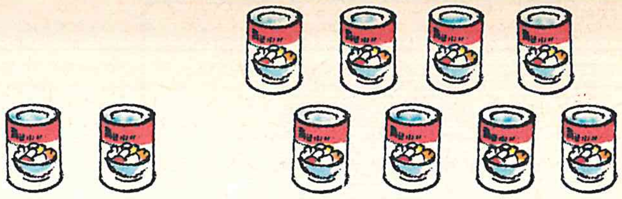


A



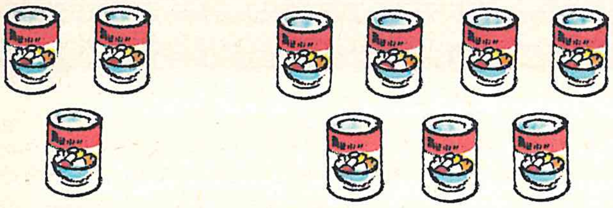
⬡ and 9 are 10.

9 and ⬡ are 10.



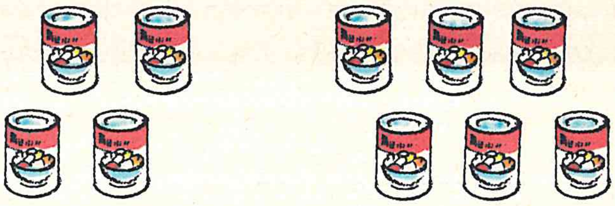
2 and △ are 10.

△ and 2 are 10.



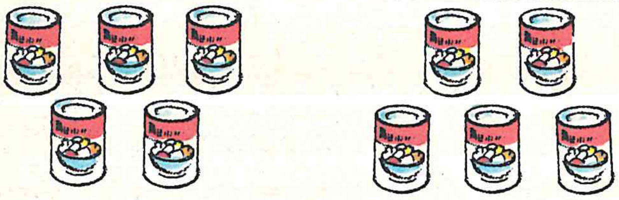
⬡ and △ are 10.

△ and ⬡ are 10.

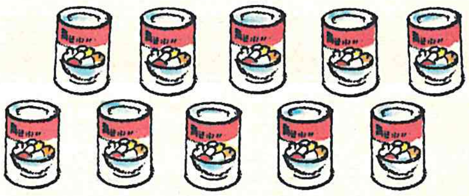


⬡ and △ are 10.

△ and ⬡ are 10.



△ and △ are 10.



⬡ and △ are 10.

△ and ⬡ are 10.

B

9 and ☐ are 10.

7 and ☐ are 10.

3 and ☐ are 10.

5 and ☐ are 10.

1 and ☐ are 10.

4 and ☐ are 10.

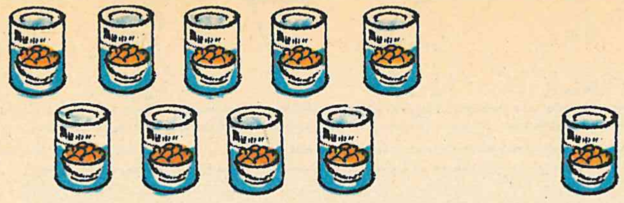
6 and ☐ are 10.

0 and ☐ are 10.

8 and ☐ are 10.

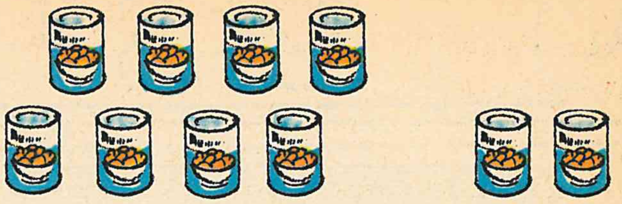
2 and ☐ are 10.

A



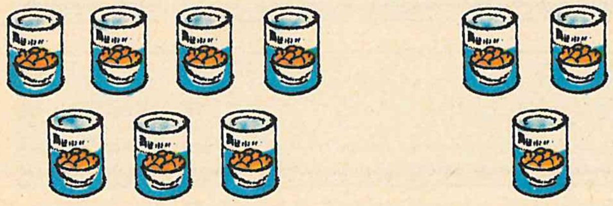
From 10 take 9. ☐ is left.

From 10 take 1. ☐ are left.



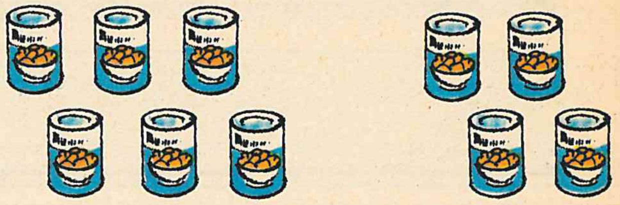
From 10 take 8. ☐ are left.

From 10 take 2. ☐ are left.



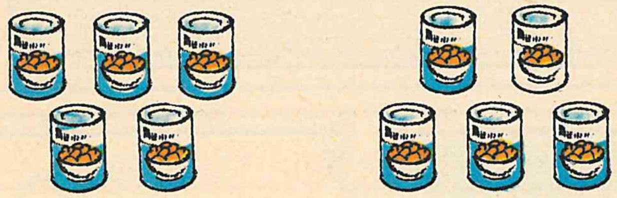
From 10 take 7. ☐ are left.

From 10 take 3. ☐ are left.

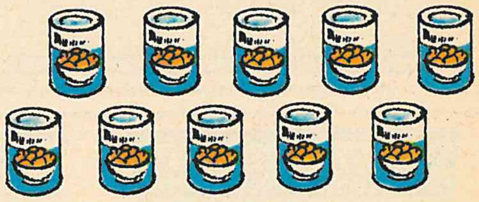


From 10 take 6. ☐ are left.

From 10 take 4. ☐ are left.



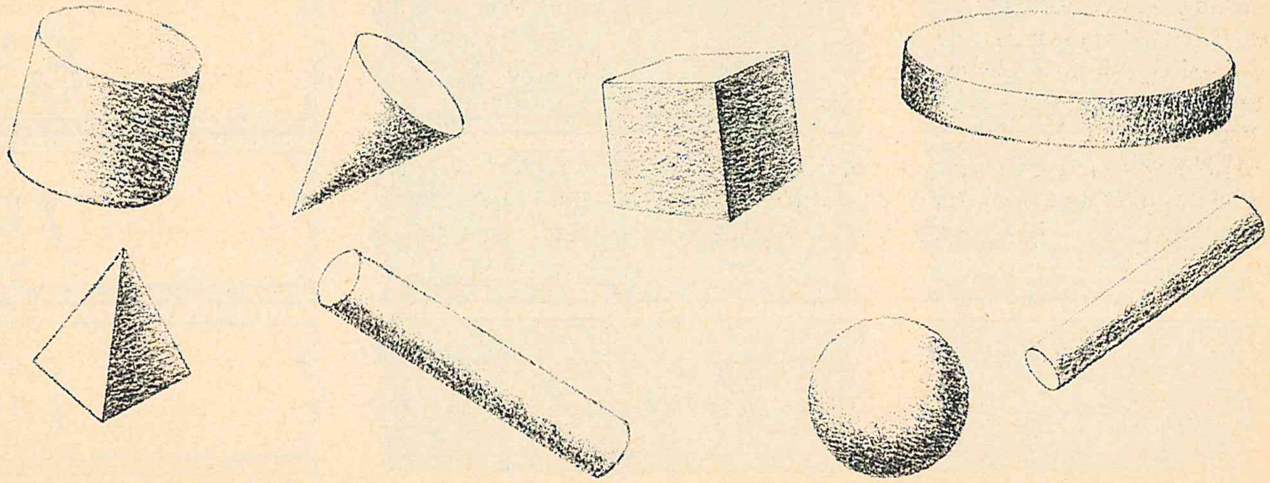
From 10 take 5. ☐ are left.



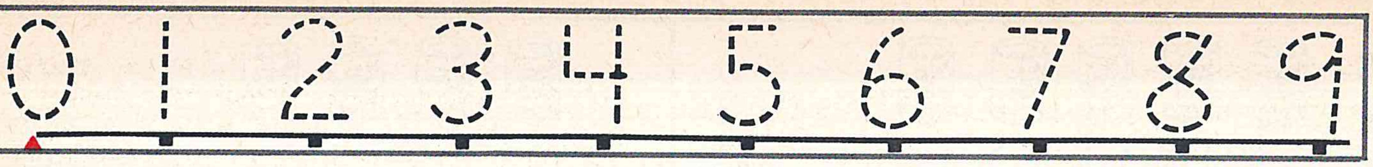
From 10 take 0. ☐ are left.

From 10 take 10. ☐ are left.

B



A



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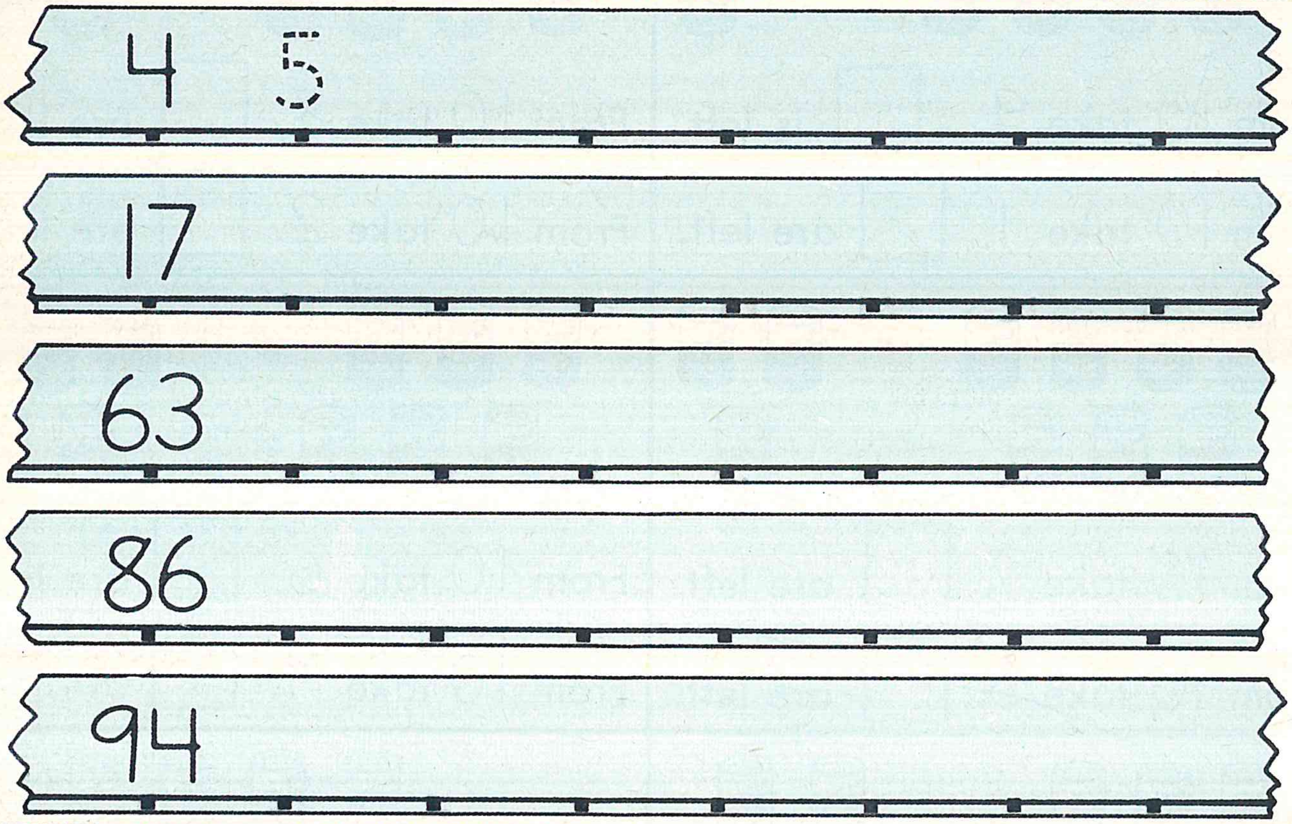

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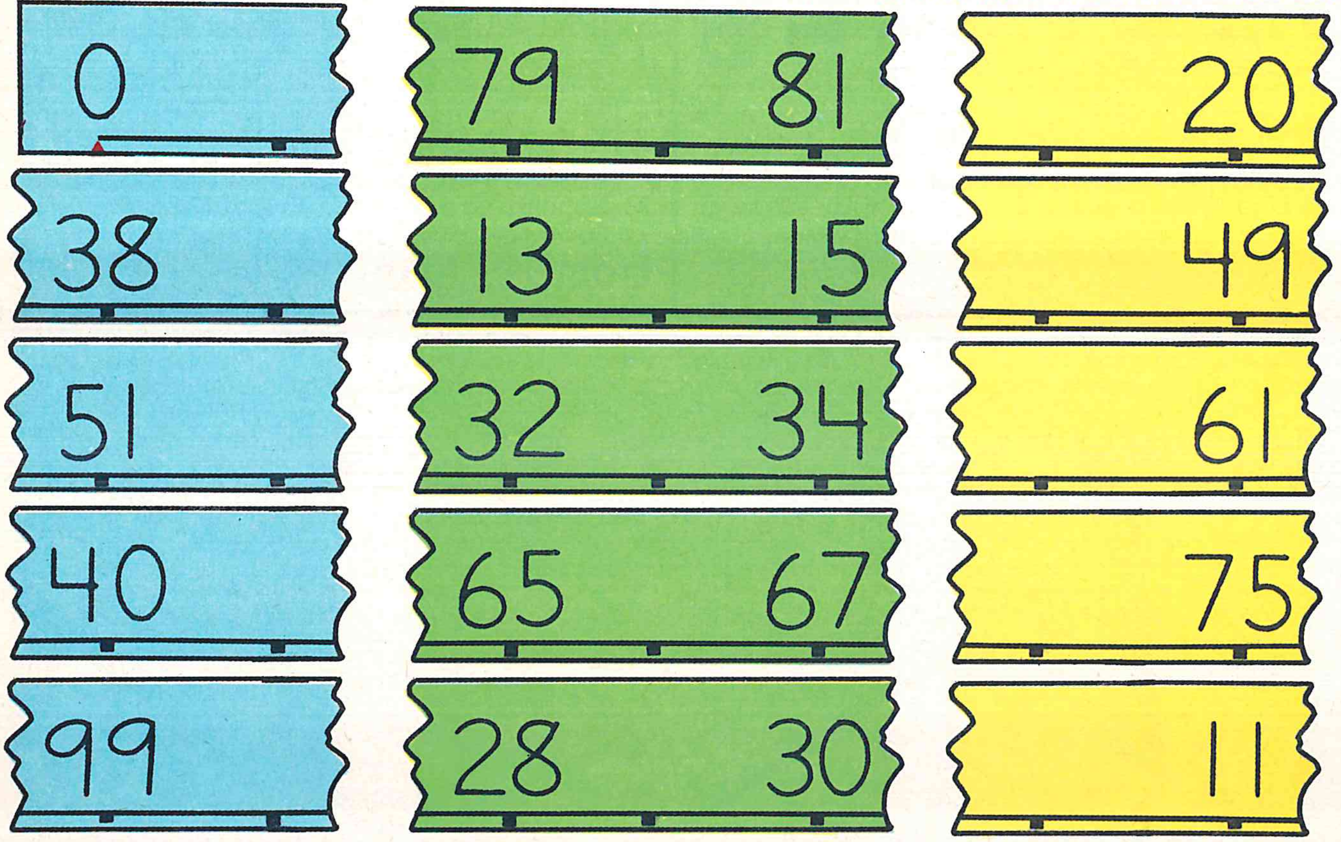
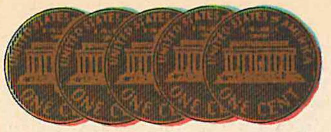


A

5 = Five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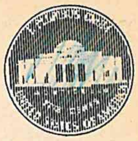

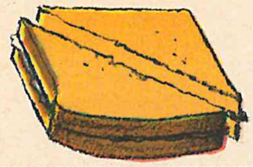
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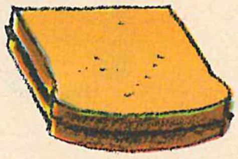

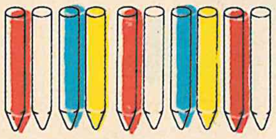
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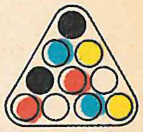

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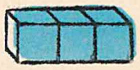
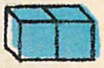
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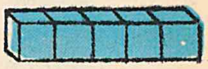
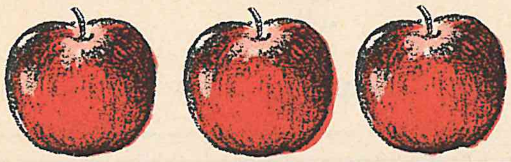
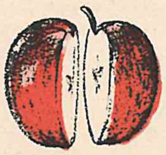
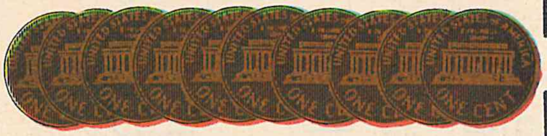


B

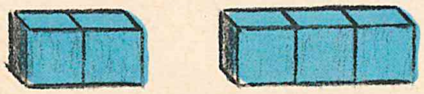


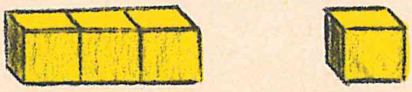


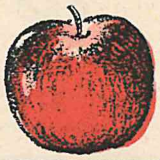


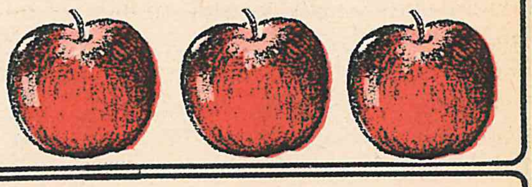
1

2

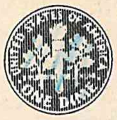


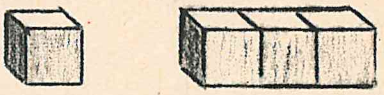




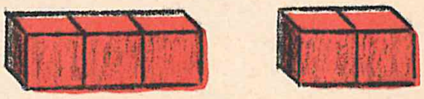


One

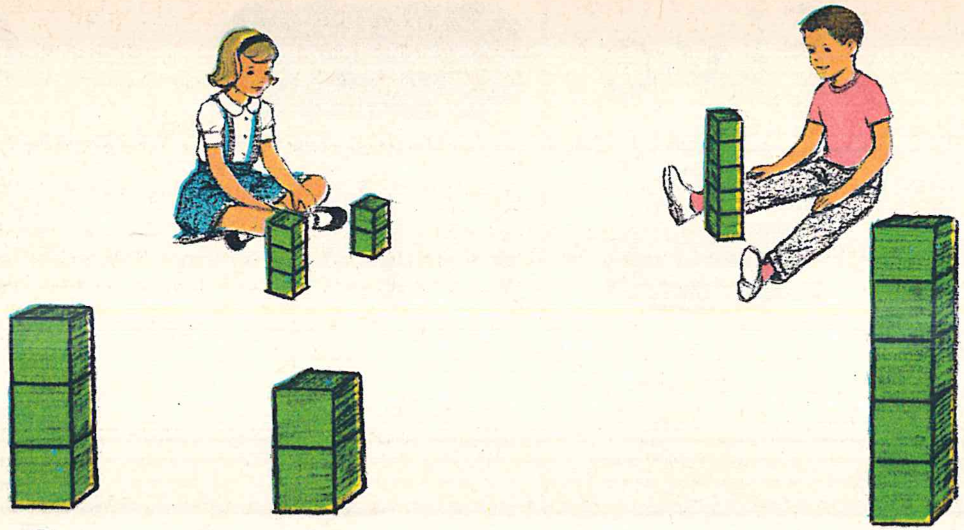




Two



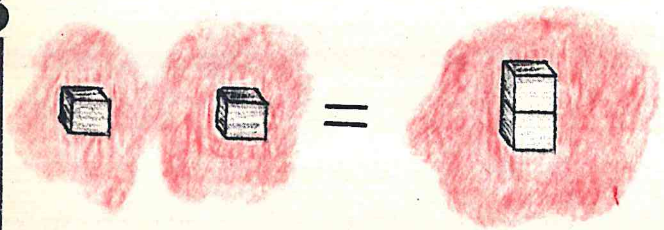
A



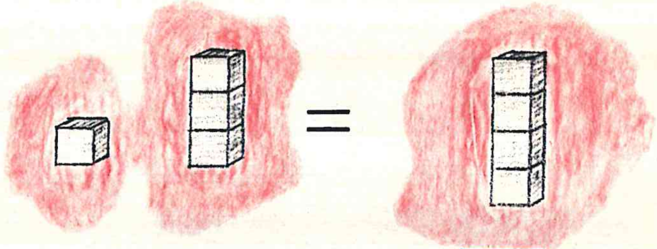
3 and 2 = 5

Three and two equals five.

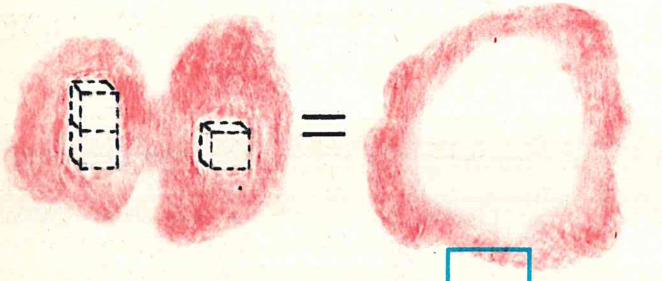
B



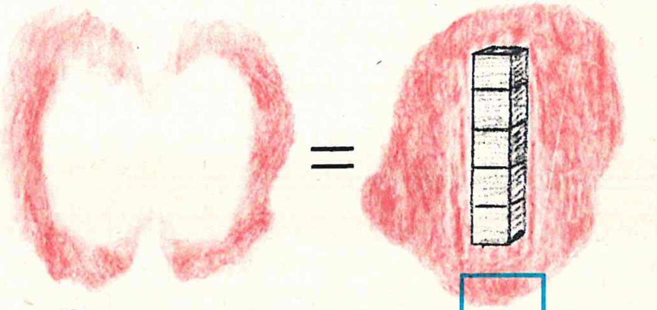
1 and 1 = ☐



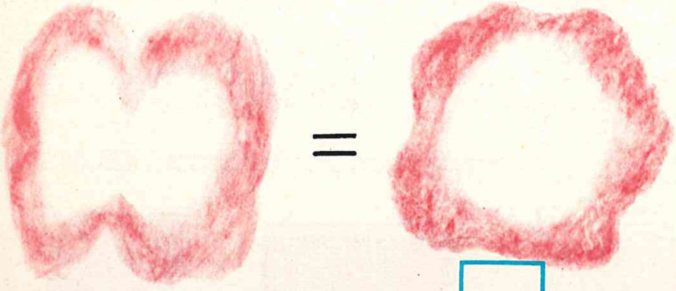
1 and 3 = ☐



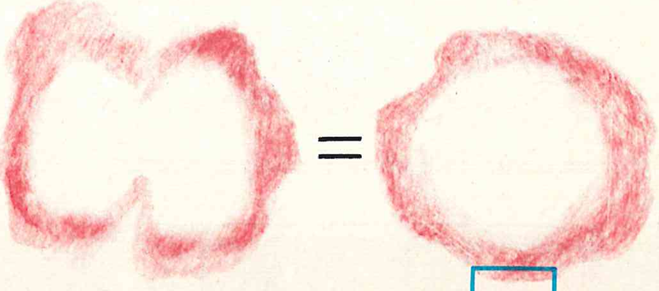
2 and 1 = ☐



2 and 3 = ☐

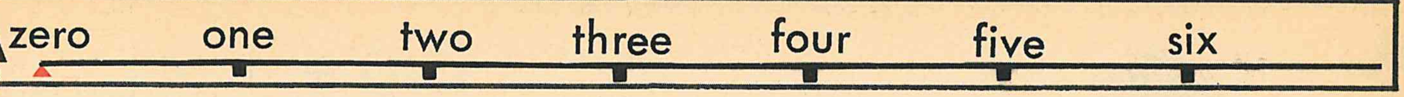


3 and 2 = ☐



1 and 2 = ☐

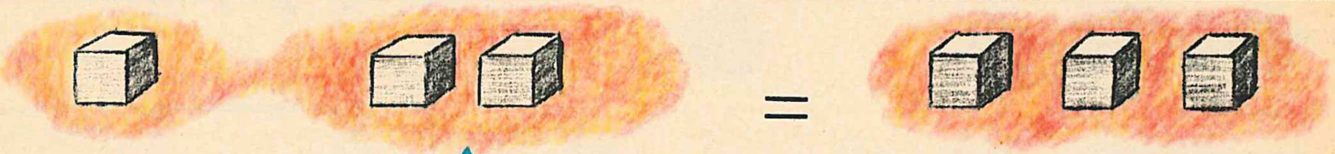
A



1 + 2 = 3

One plus two equals three.

B



⬡ + △ = □

One plus two equals three.

C

○○○○ ○ = ○○○○○

4 + 1 = □

Four plus one equals five.

○○ ○○○○ = ○○○○○○

2 + 4 = □

Two plus four equals six.

D

○ ○○○ = ◯

1 + 3 = □

One plus three equals four.

○○○○ ○○ = ◯

⬡4 + □2 = △

Four plus two equals six.

E

○○○ ○○○ = ○○○○○○

3 + 3 = □

Three plus three equals ______

○○ ○○ = ○○○○

2 + 2 = □

Two plus two equals ______

F

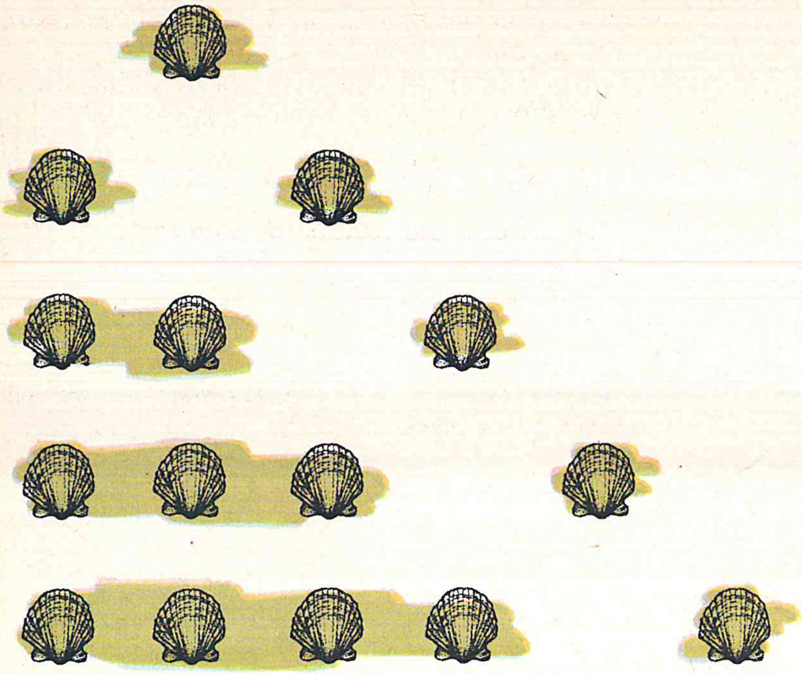
△ + ⬡ = □

Three plus one equals four.

□ + △ = ⬡

Three plus two equals five.

A



0 + 1 = □

1 + 1 = □

2 + 1 = □

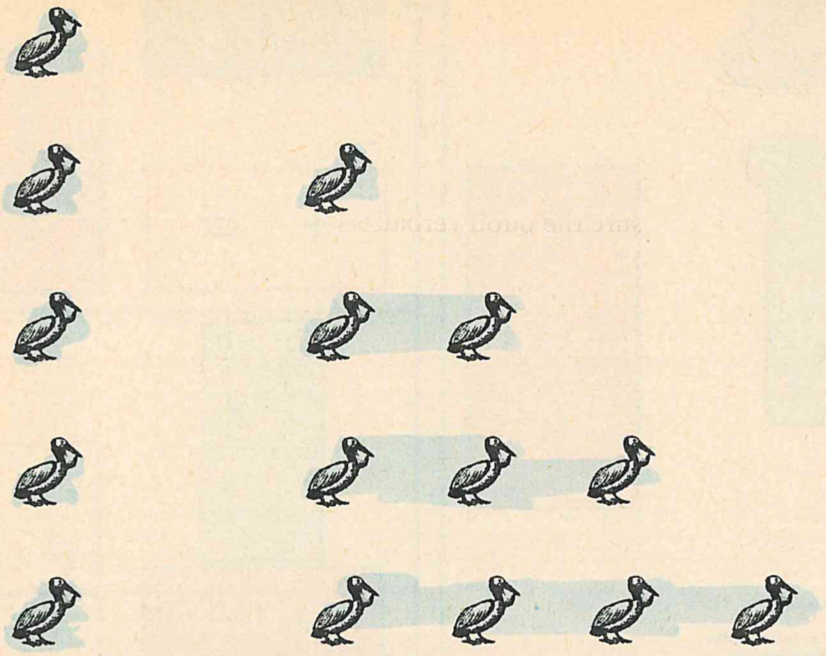
3 + 1 = □

△ + 1 = □

B

6 + 1 = □	8 + 1 = □	7 + 1 = □
5 + 1 = □	9 + 1 = □	0 + 2 = □
1 + 2 = □	2 + 2 = □	4 + 2 = □
3 + 2 = □	6 + 2 = □	5 + 2 = □
8 + 2 = □	7 + 2 = □	0 + 3 = □
1 + 3 = □	2 + 3 = □	4 + 3 = □
3 + 3 = □	6 + 3 = □	5 + 3 = □
7 + 3 = □	0 + 4 = □	1 + 4 = □

A



1 + 0 = ☐

1 + 1 = ☐

1 + 2 = ☐

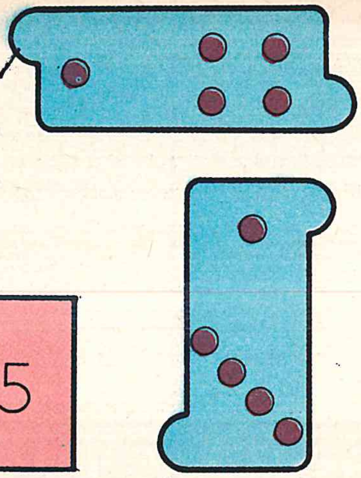
1 + 3 = ☐

1 + △ = ☐

B

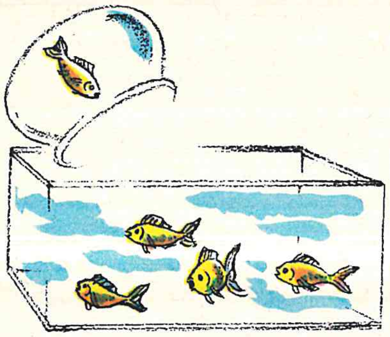
1 + 6 = ☐	1 + 8 = ☐	1 + 7 = ☐
1 + 5 = ☐	1 + 9 = ☐	2 + 0 = ☐
2 + 1 = ☐	2 + 2 = ☐	2 + 4 = ☐
2 + 3 = ☐	2 + 6 = ☐	2 + 5 = ☐
2 + 8 = ☐	2 + 7 = ☐	3 + 0 = ☐
3 + 1 = ☐	3 + 2 = ☐	3 + 4 = ☐
3 + 3 = ☐	3 + 6 = ☐	3 + 5 = ☐
3 + 7 = ☐	4 + 0 = ☐	4 + 1 = ☐

A

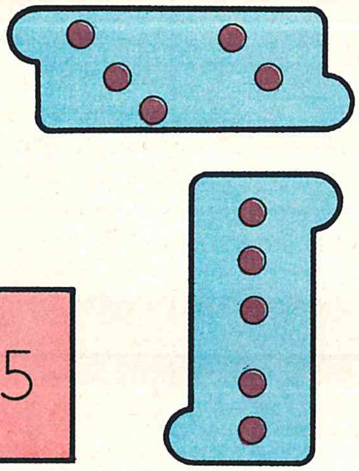


1 + 4 = 5

$$\begin{array}{r}1\\+4\\\hline 5\end{array}$$

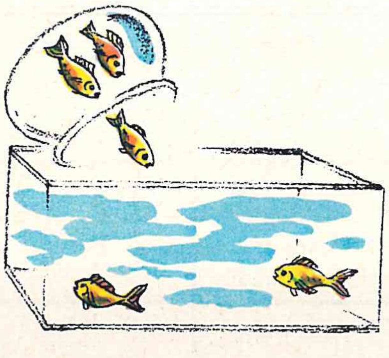


One plus four equals five.



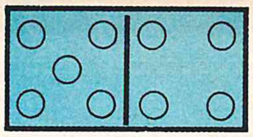
3 + 2 = 5

$$\begin{array}{r}3\\+2\\\hline 5\end{array}$$



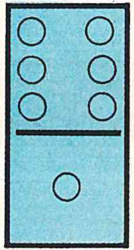
Three plus two equals five.

B



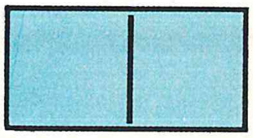
+ =

$$\begin{array}{r}5\\+4\\\hline 9\end{array}$$



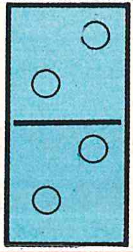
6 + 1 = 7

$$\begin{array}{r}\\+\\\hline \\\end{array}$$



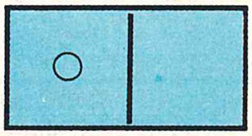
3 + 3 = 6

$$\begin{array}{r}3\\+3\\\hline 6\end{array}$$



+ =

$$\begin{array}{r}\\+\\\hline \\\end{array}$$



+2 =

$$\begin{array}{r}\\+\\\hline 3\end{array}$$

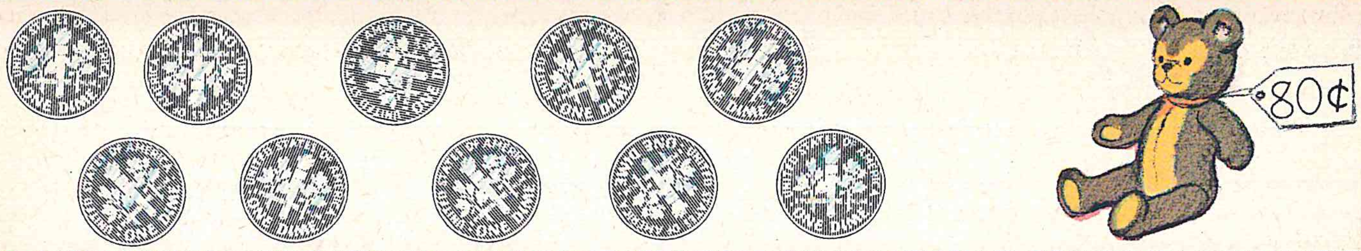
A

5 ●●● ●● +3 ○	6 ●●●● ●● +4 ○	7 ●●●● ●●● +0 ○	4 ●●●● +5 ○
2 ●● +5 ○	5 ●●● ●● +5 ○	3 ●●● +4 ○	2 ●● +6 ○

B

1 +8 ○	8 +1 ○	3 +7 ○	7 +2 ○	4 +5 ○	6 +4 ○	3 +1 ○	3 +3 ○
5 +5 ○	1 +5 ○	8 +0 ○	9 +1 ○	1 +2 ○	2 +7 ○	4 +6 ○	2 +5 ○
2 +8 ○	6 +2 ○	3 +4 ○	4 +4 ○	5 +2 ○	3 +6 ○	0 +9 ○	7 +3 ○
7 +1 ○	3 +5 ○	2 +4 ○	5 +4 ○	1 +9 ○	2 +2 ○	6 +3 ○	5 +3 ○

A



B

49	26	28	55
76	39	41	80
83	67	69	100

C

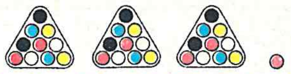
𝍸 𝍸 || ____

𝍸 𝍸 𝍸
𝍸 𝍸 𝍸
|| ____

80 and 7 ____

70 and 8 ____

50 and 0 ____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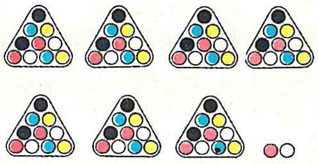
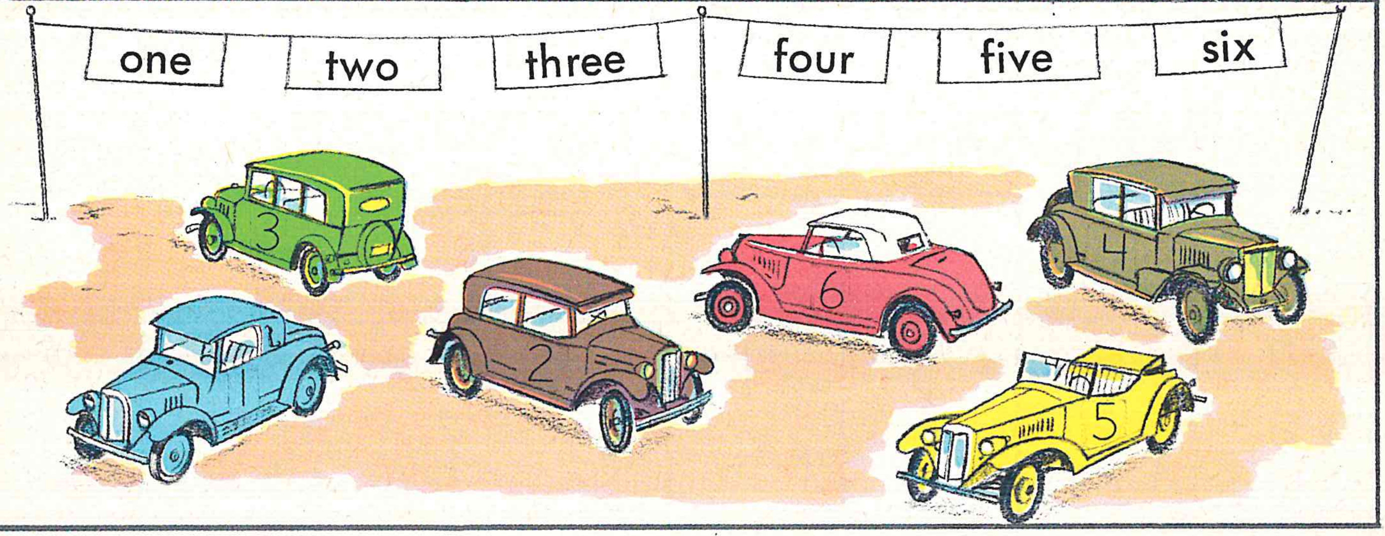

____

D



E

4 and 5 are ☐.

7 and △ are 8.

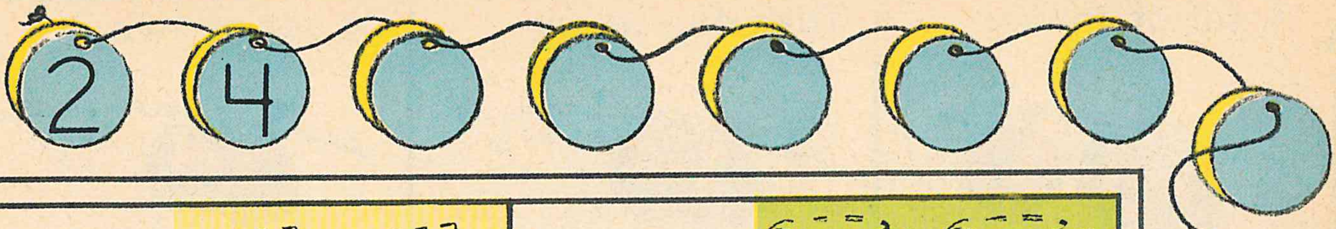
▽ and 2 are 4.

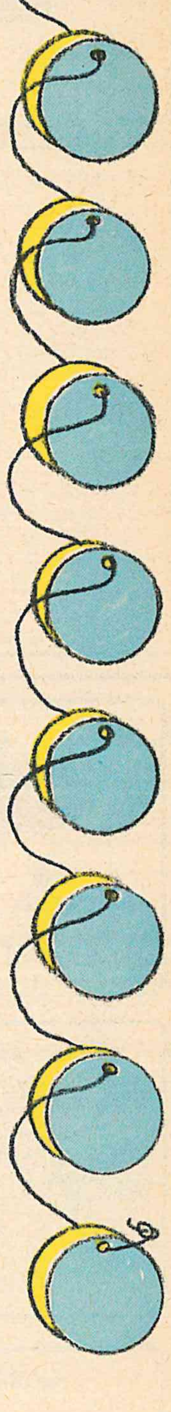
From 7 take 3. ⬡ are left.

From 5 take ▽. 0 are left.

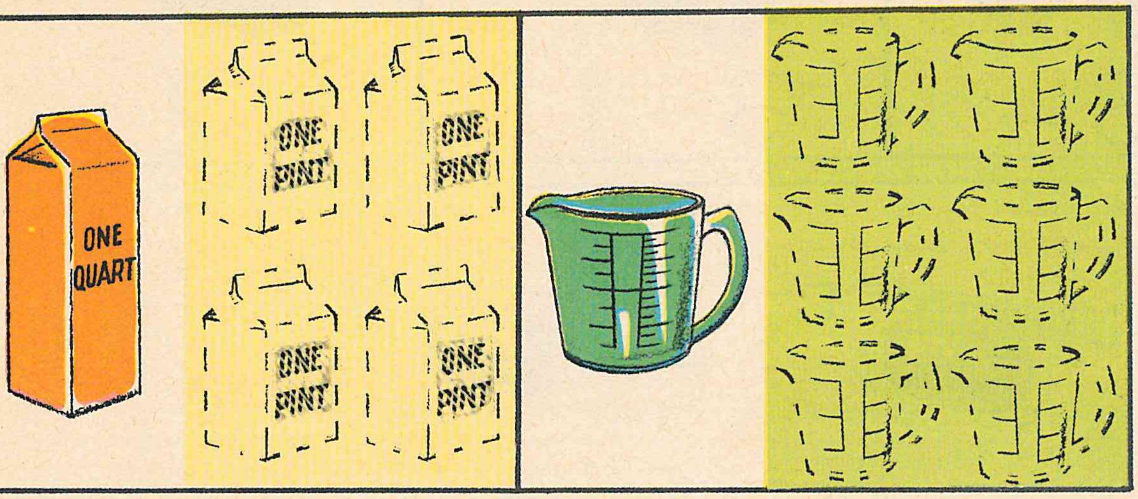
From ☐ take 1. 9 are left.

A





B



C

9 + 1 = ☐ 6 + 3 = ☐ 5 + 5 = ☐

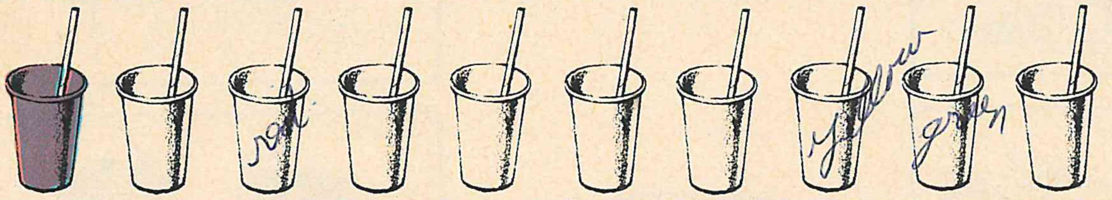
2 + 5 = ☐ 4 + 4 = ☐ 6 + 2 = ☐

D

$\begin{array}{r}3\\+6\\\hline\end{array}$ $\begin{array}{r}1\\+8\\\hline\end{array}$ $\begin{array}{r}7\\+2\\\hline\end{array}$ $\begin{array}{r}1\\+6\\\hline\end{array}$ $\begin{array}{r}5\\+3\\\hline\end{array}$ $\begin{array}{r}8\\+2\\\hline\end{array}$

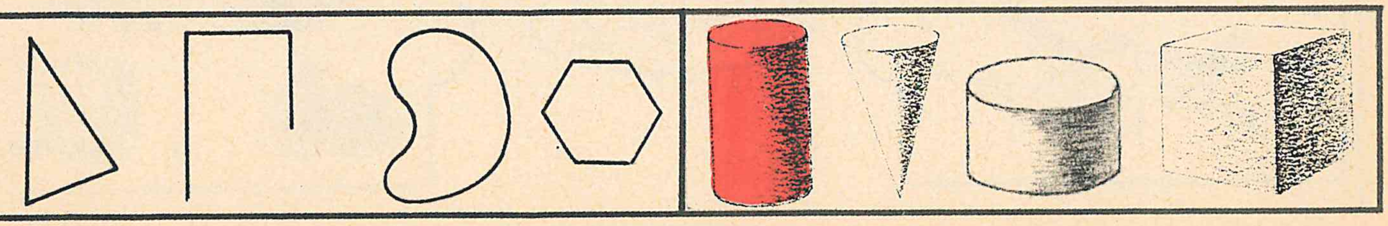
$\begin{array}{r}7\\+3\\\hline\end{array}$ $\begin{array}{r}5\\+4\\\hline\end{array}$ $\begin{array}{r}4\\+1\\\hline\end{array}$ $\begin{array}{r}5\\+2\\\hline\end{array}$ $\begin{array}{r}6\\+4\\\hline\end{array}$ $\begin{array}{r}4\\+0\\\hline\end{array}$

E



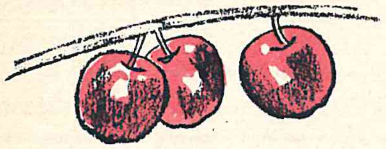
red yellow green

F



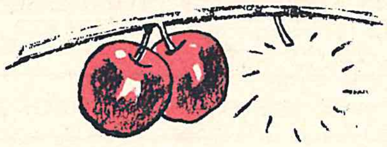
A

A set of three.



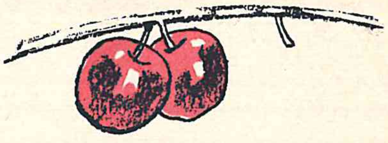
3

Take one away.

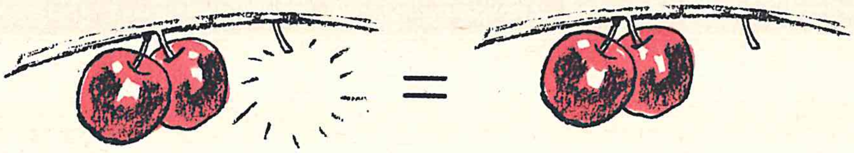


3 − 1

A set of two.



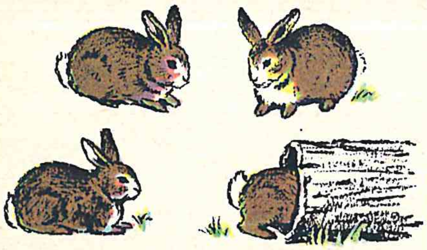
2



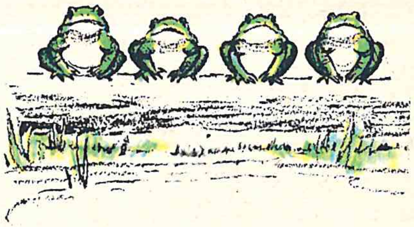
3 − 1 = 2

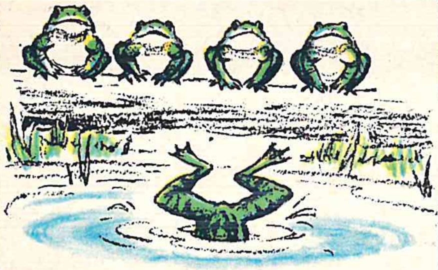
Three minus one equals two.

B

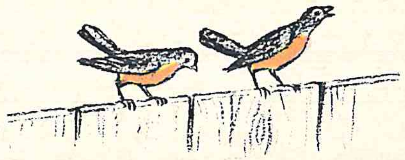


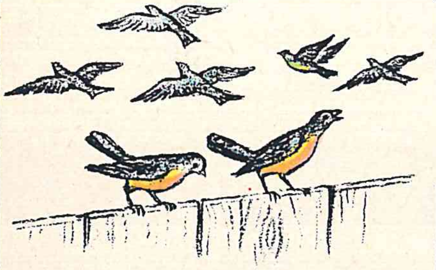
5−1=4



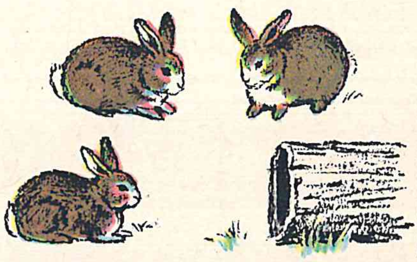


4−1=3

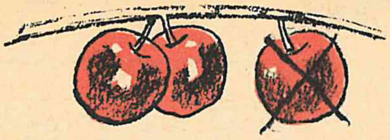




7−5=2

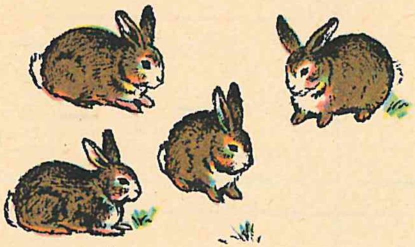


A



3 − 1 = □

Three minus one equals two.



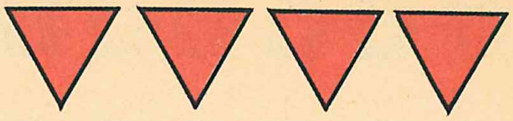
4 − 1 = □

Four minus one equals three.

5 − ⬡ = □

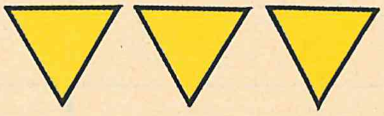
Five minus one equals four.

B

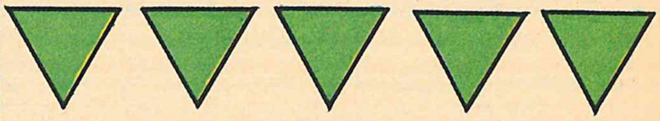


4 − 2 = □

5 − 1 = □



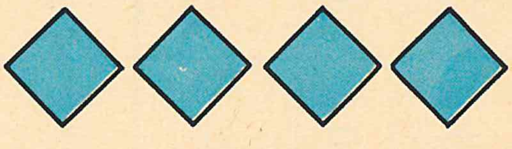
3 − 2 = □



5 − 2 = □

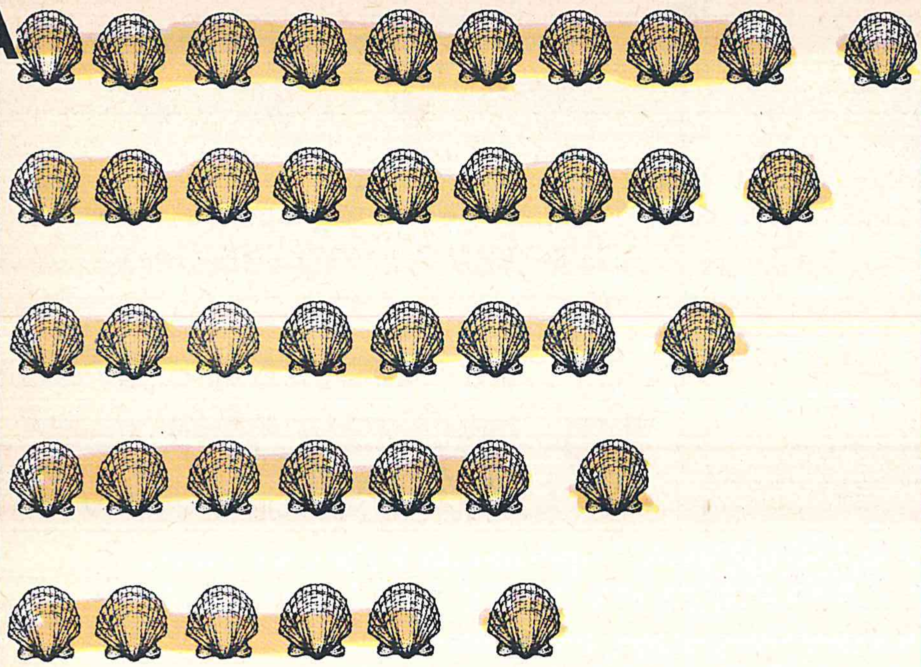
C

5 − ⬡ = □



4 − ⬡ = □

A



10 − 1 = □

9 − 1 = □

8 − 1 = □

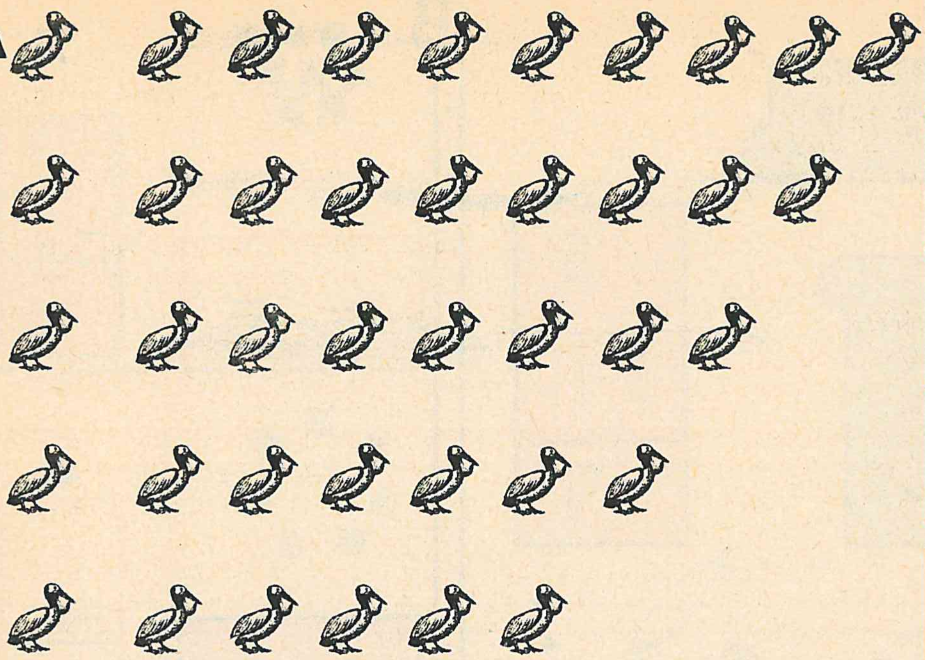
7 − 1 = □

△ − 1 = □

B

5 − 1 = □
2 − 1 = □
3 − 1 = □
4 − 1 = □
1 − 0 = □
6 − 2 = □
7 − 2 = □
8 − 2 = □
9 − 2 = □
10 − 2 = □
5 − 2 = □
4 − 2 = □
7 − 3 = □
6 − 3 = □
8 − 3 = □
10 − 3 = □
4 − 3 = □
5 − 3 = □
6 − 4 = □
8 − 4 = □
9 − 4 = □
7 − 4 = □
10 − 4 = □
4 − 4 = □

A



10 − 9 = ☐

9 − 8 = ☐

8 − 7 = ☐

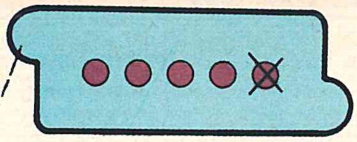
7 − 6 = ☐

△ − 5 = ☐

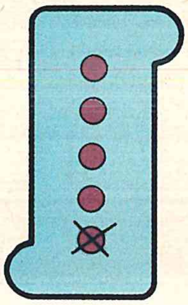
B

5 − 4 = ☐	2 − 1 = ☐	3 − 2 = ☐
4 − 3 = ☐	1 − 1 = ☐	6 − 4 = ☐
7 − 5 = ☐	8 − 6 = ☐	9 − 7 = ☐
10 − 8 = ☐	5 − 3 = ☐	4 − 2 = ☐
7 − 4 = ☐	6 − 3 = ☐	8 − 5 = ☐
10 − 7 = ☐	4 − 1 = ☐	5 − 2 = ☐
6 − 2 = ☐	8 − 4 = ☐	9 − 5 = ☐
7 − 3 = ☐	10 − 6 = ☐	4 − 0 = ☐

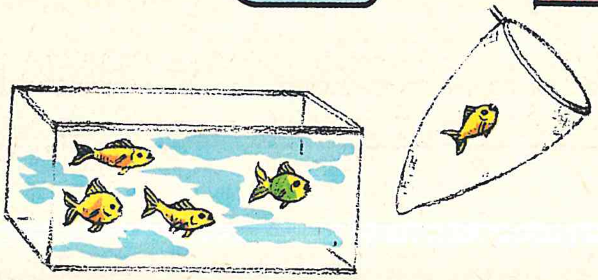
A



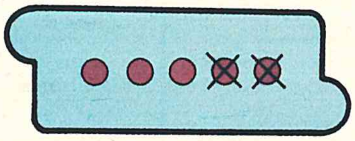
5 − 1 = 4



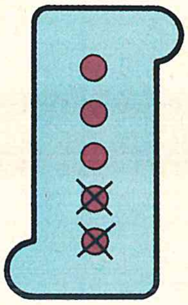
5
− 1
4



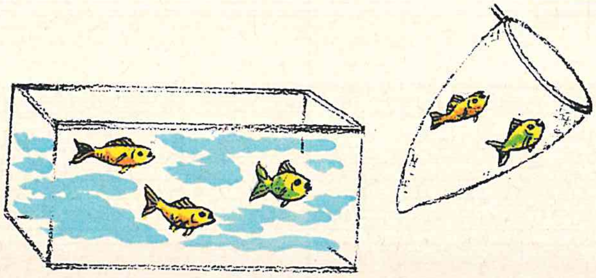
Five minus one equals four.



5 − 2 = 3

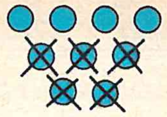


5
− 2
3



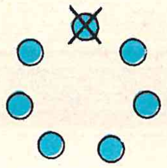
Five minus two equals three.

B



− =

9
− 5
4

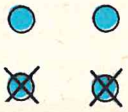


7 − 1 = 6

−

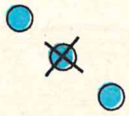
6 − 3 = 3

6
− 3
3



− =

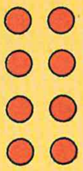
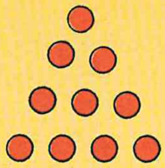
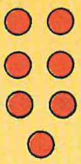
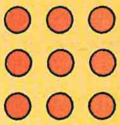
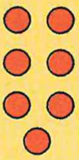
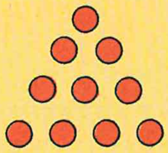
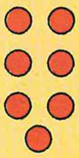
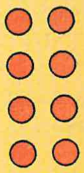
−



− 1 =

−
2

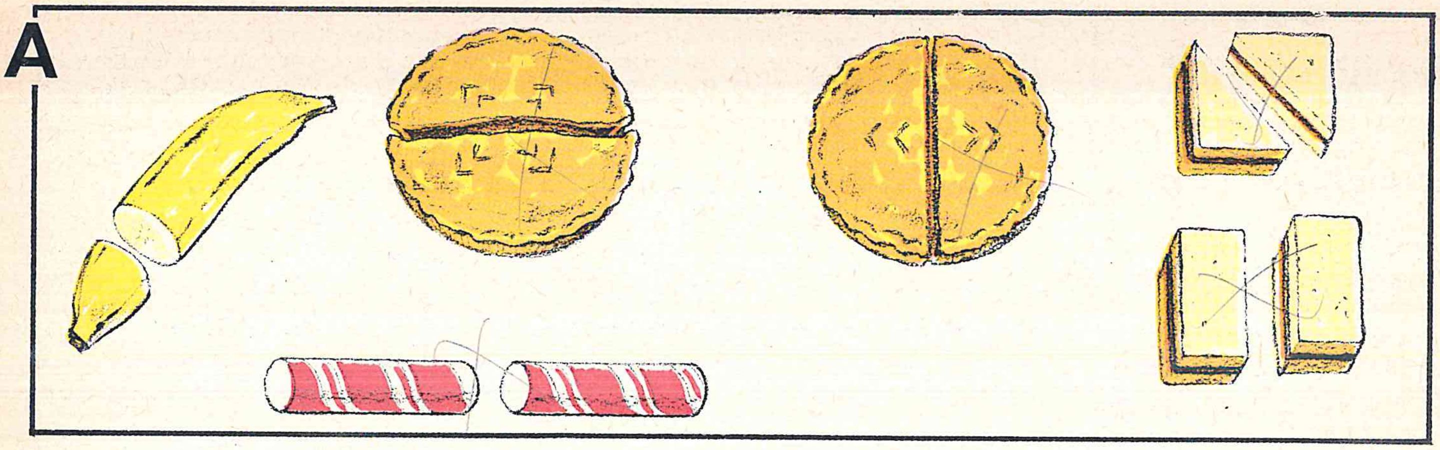
A

8 − 3 	10 − 4 	7 − 0 	9 − 5 
7 − 2 	10 − 5 	7 − 3 	8 − 2 

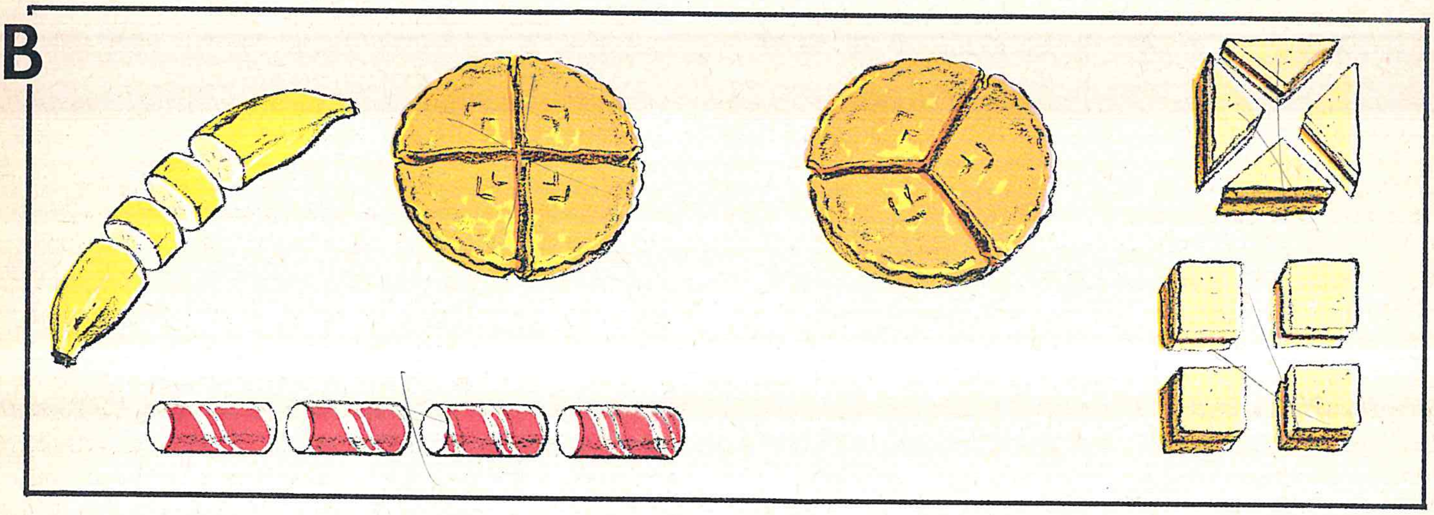
B

9 − 1	9 − 8	10 − 3	9 − 7	9 − 4	10 − 6	4 − 3	6 − 3
10 − 5	6 − 1	8 − 8	10 − 9	3 − 1	9 − 2	10 − 4	7 − 2
10 − 2	8 − 6	7 − 3	8 − 4	9 − 5	9 − 3	9 − 0	10 − 7
8 − 7	8 − 3	6 − 2	9 − 5	10 − 1	4 − 2	9 − 6	8 − 5

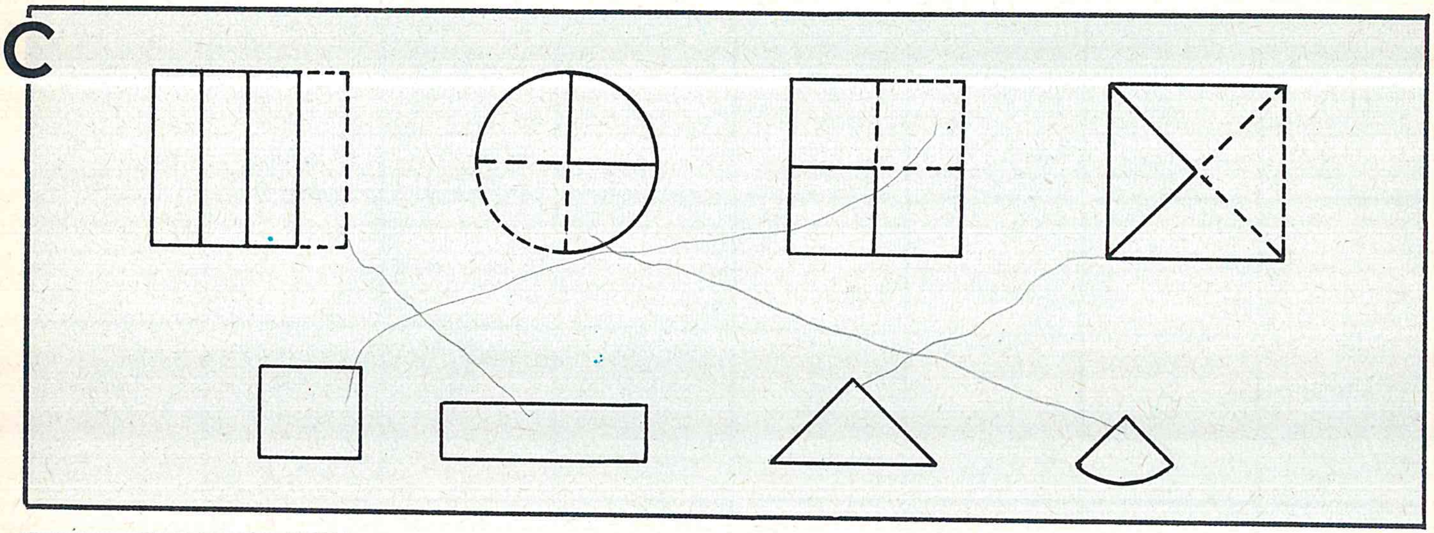
A



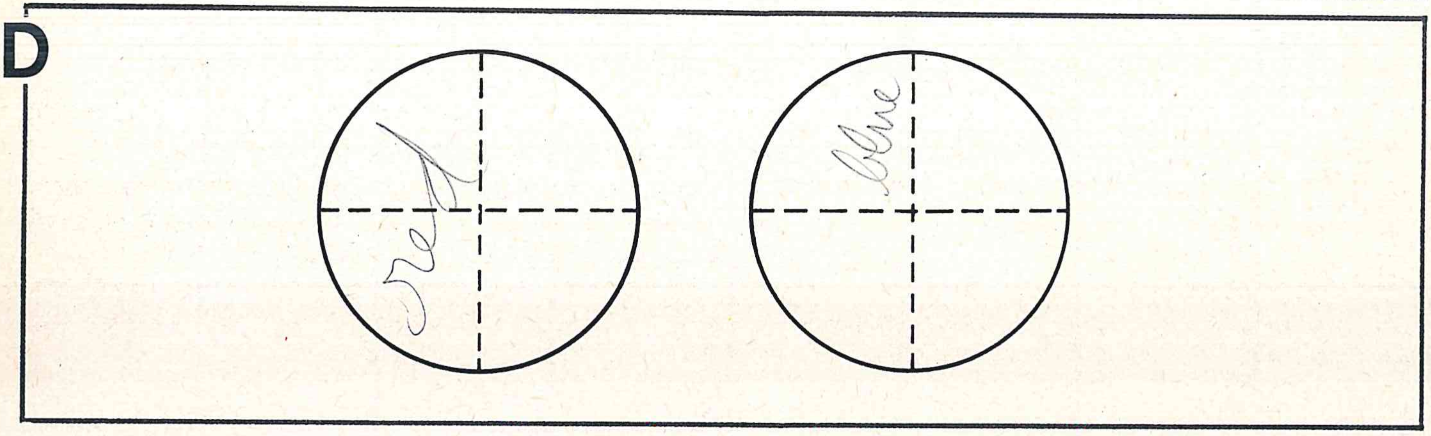
B



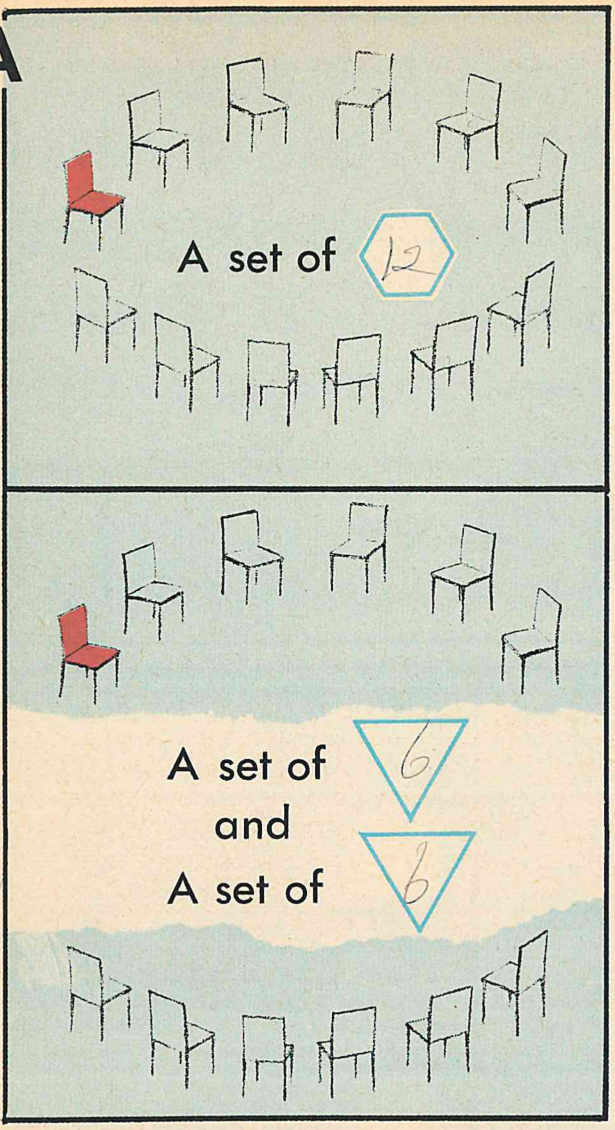
C



D



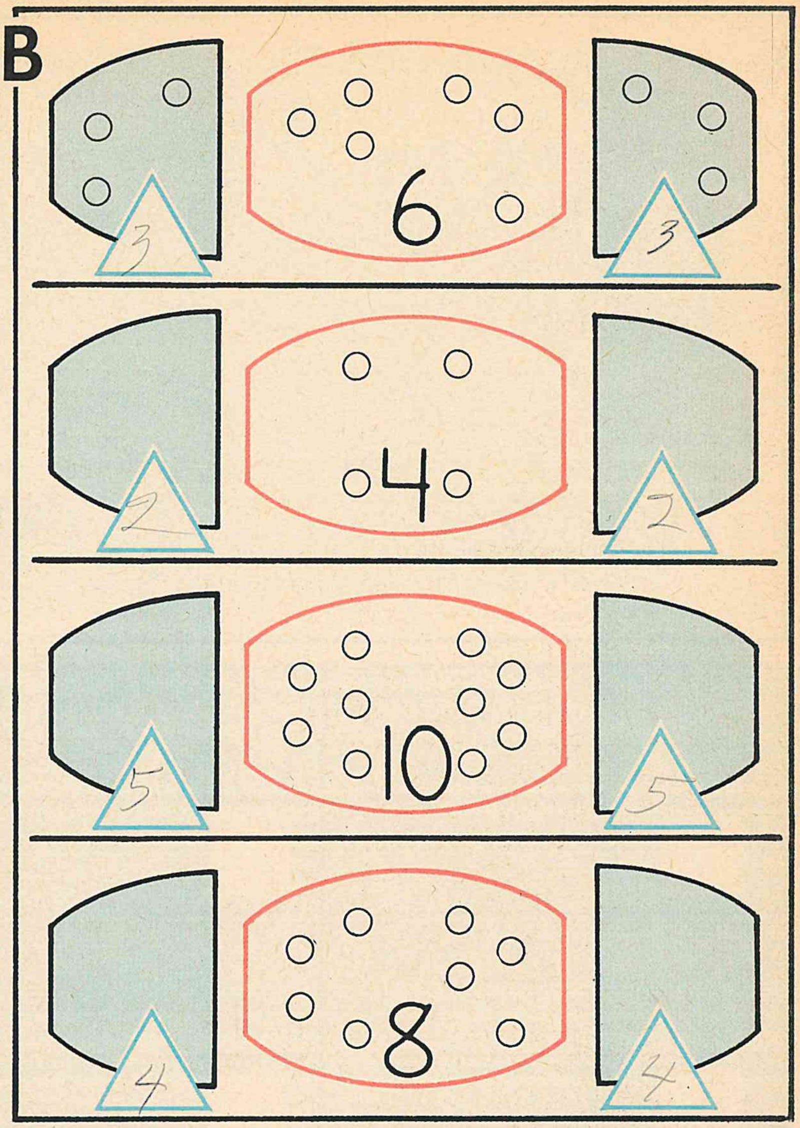
A



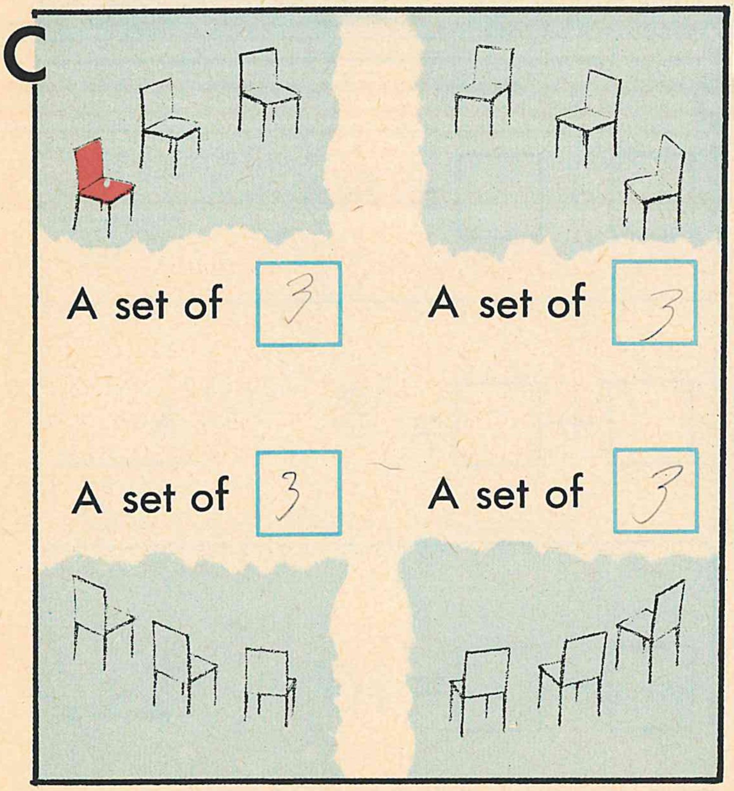
A set of 12

A set of 6
and
A set of 6

B



C



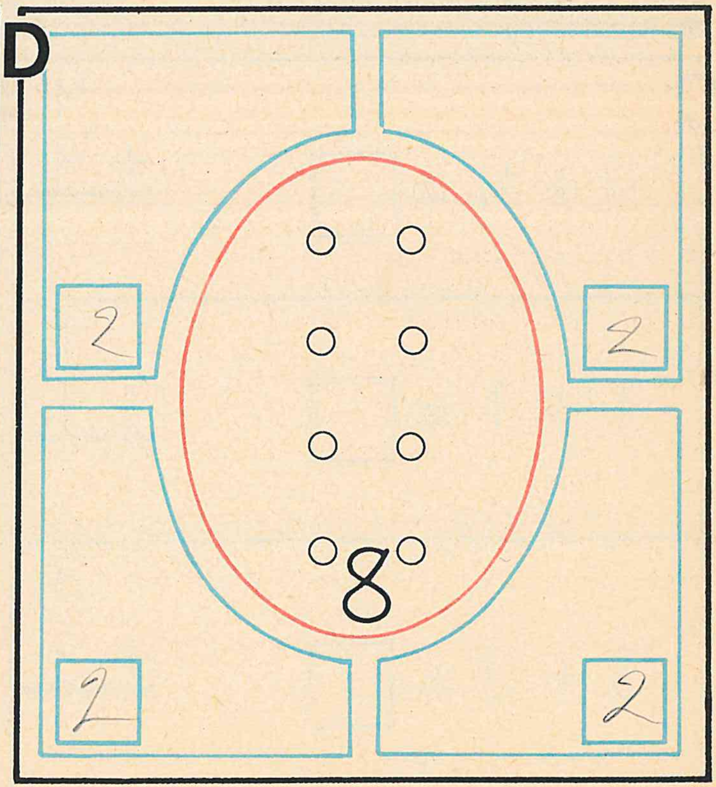
A set of 3

A set of 3

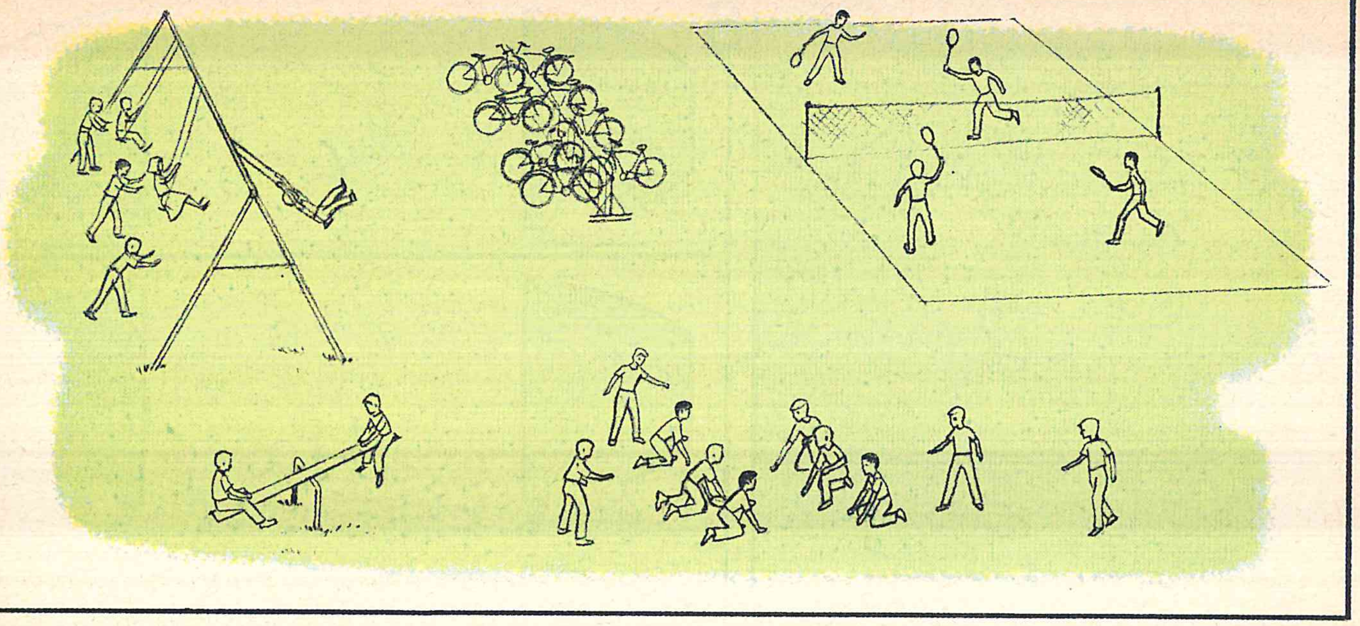
A set of 3

A set of 3

D



A



B

3 ○ ○ ○ +3 ◌ ◌ ◌ □	5 ☽☽☽☽☽ +5 □	1 ☆ + 1 □
2 △ △ +2 □	4 ◇◇◇◇ +4 □	6 □□□□□□ +6 □

C

4 + 4 = □

$$\begin{array}{r} 4 \\ +\ 4 \\ \hline \square \end{array}$$

1 + 1 = □

$$\begin{array}{r} 1 \\ +\ 1 \\ \hline \square \end{array}$$

3 + 3 = □

$$\begin{array}{r} 3 \\ +\ 3 \\ \hline \square \end{array}$$

D

□ + □ = 4

$$\begin{array}{r} \square \\ +\ \square \\ \hline 4 \end{array}$$

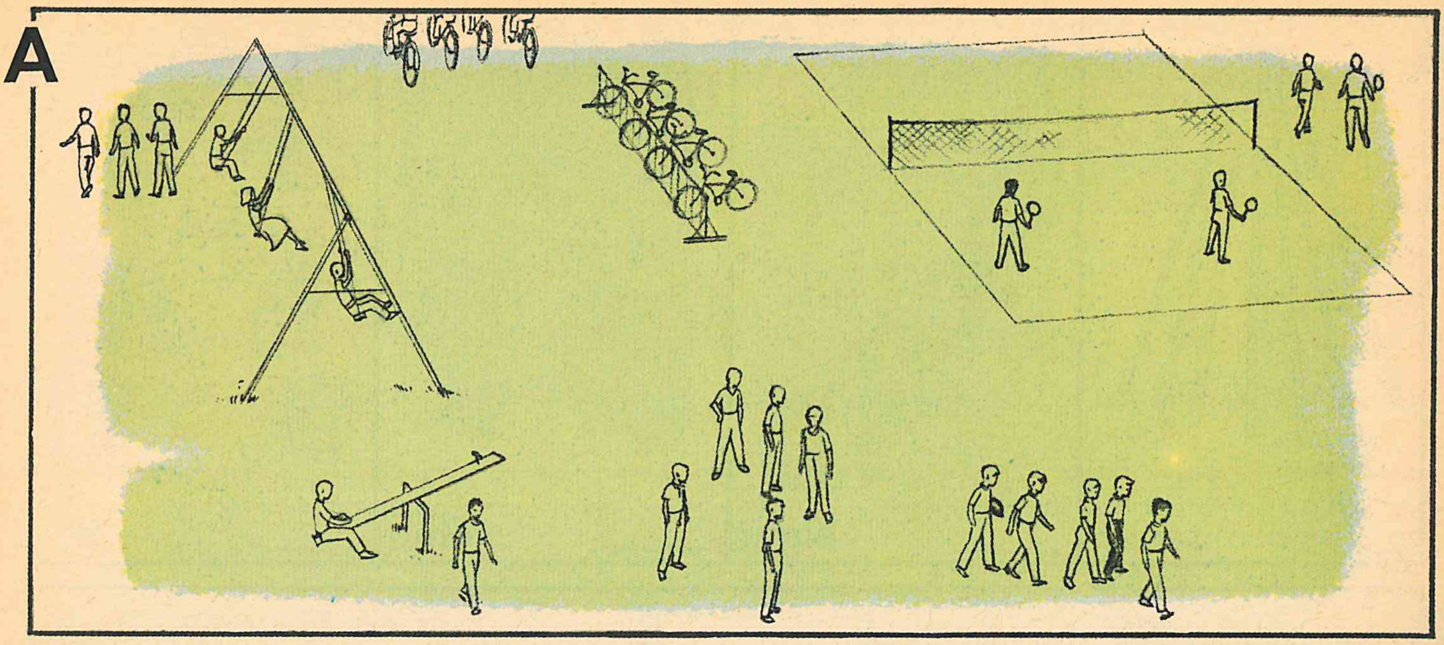
□ + □ = 8

$$\begin{array}{r} \square \\ +\ \square \\ \hline 8 \end{array}$$

□ + □ = 10

$$\begin{array}{r} \square \\ +\ \square \\ \hline 10 \end{array}$$

A



B

6
−3
○ ○ ○
⊗ ⊗ ⊗
□

10
− 5
☽ ☽ ☽ ☽ ☽
☽ ☽ ☽ ☽ ☽
□

2
−1
☆ ☆
□

4
−2
△ △
△ △
□

8
−4
◇ ◇ ◇ ◇
◇ ◇ ◇ ◇
□

12
−6
□ □ □ □ □ □
□ □ □ □ □ □
□

C

8 − 4 = □
8
−4
□

2 − 1 = □
2
− 1
□

6 − 3 = □
6
−3
□

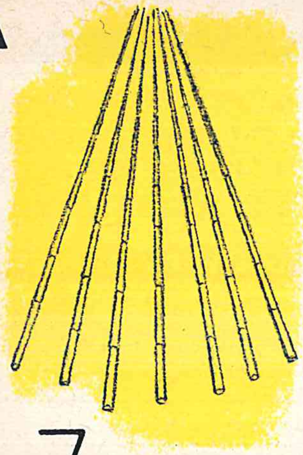
D

□ − 2 = 2
□
− 2
2

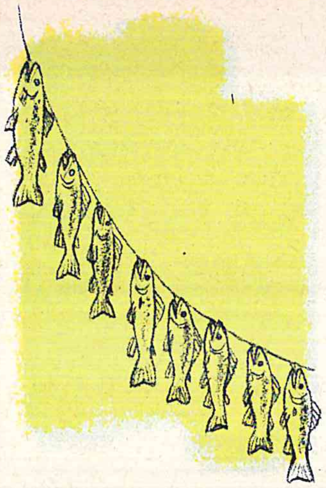
□ − 4 = 4
□
−4
4

□ − 5 = 5
□
− 5
5

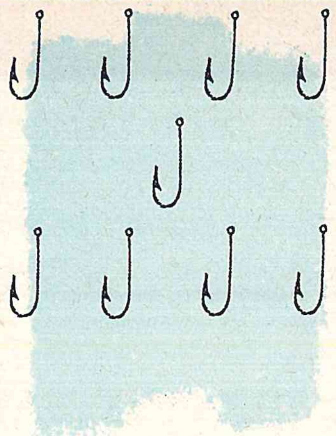
A



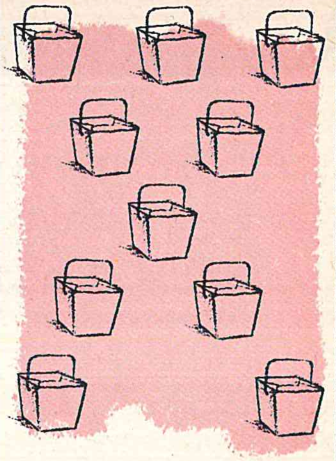
7 seven



eight

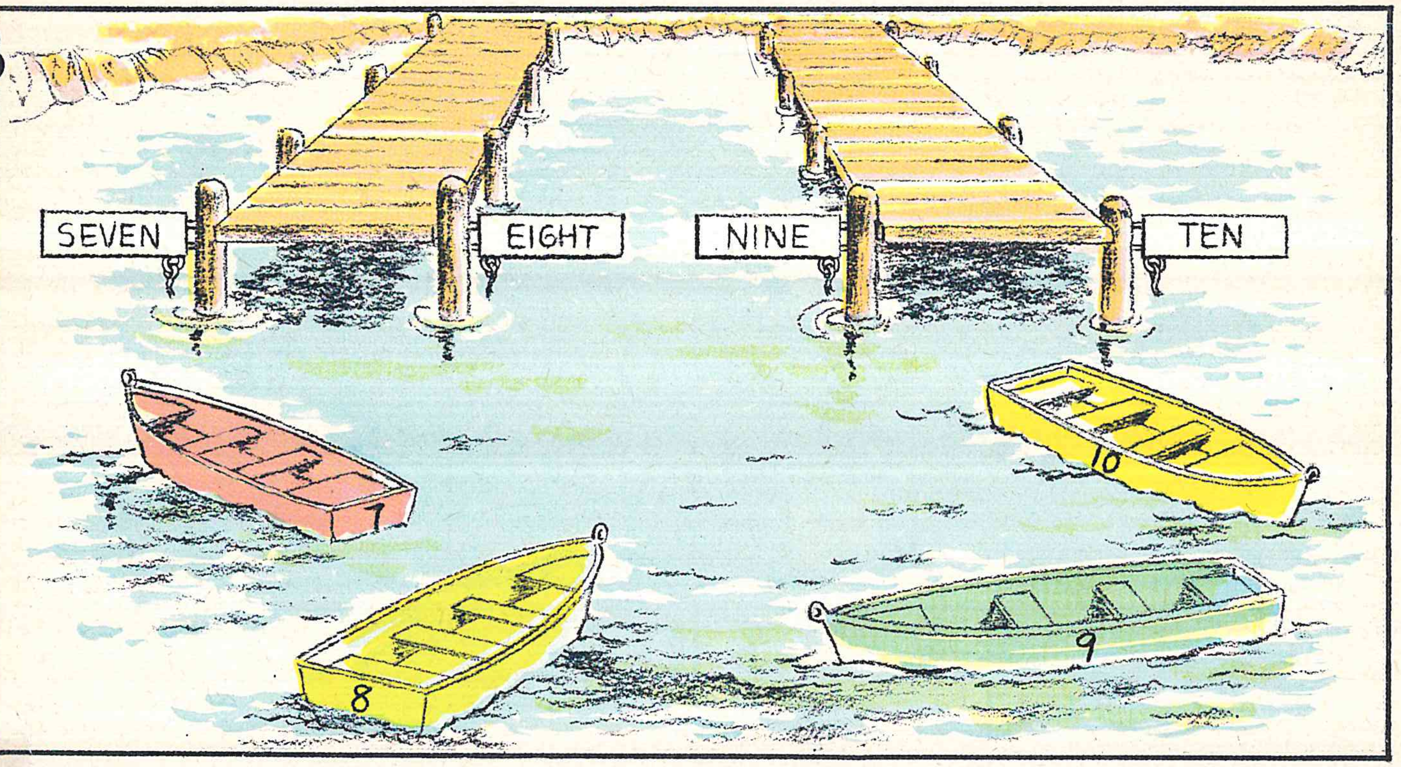


nine

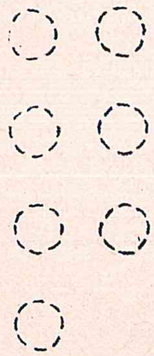


ten

B



C



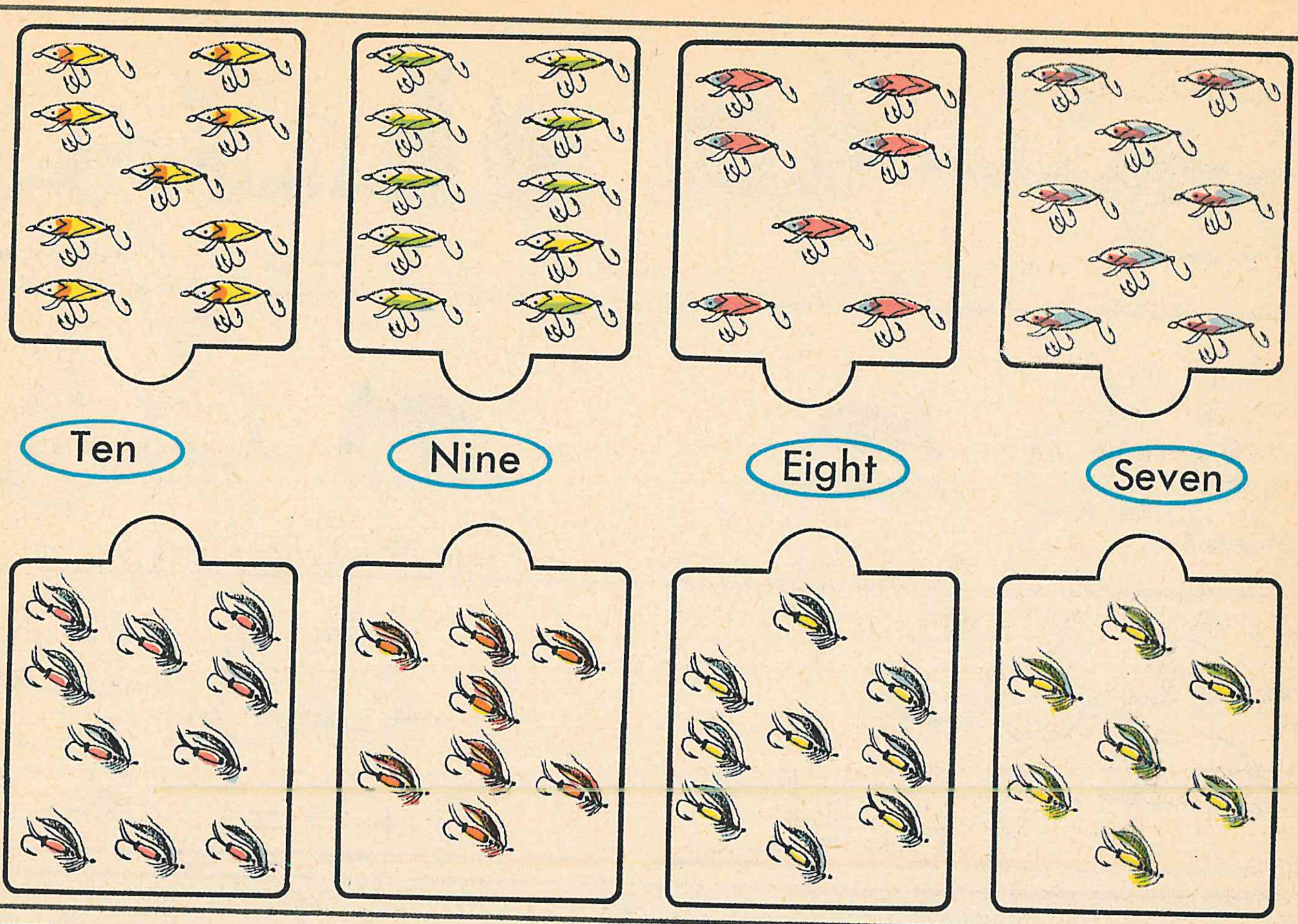
Seven 7

Ten

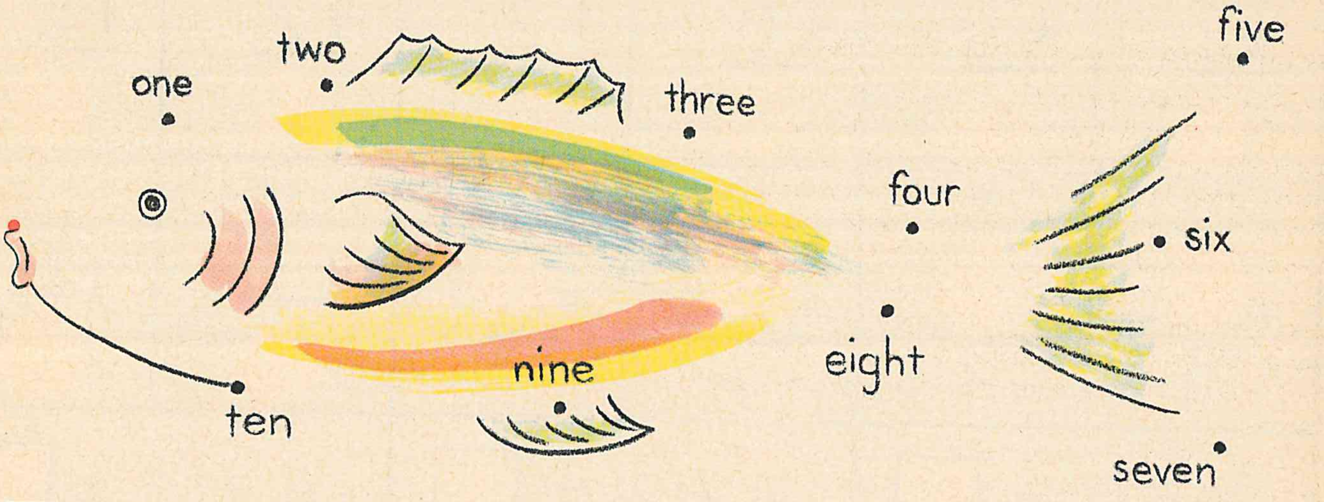
Nine

Eight

A



B



C

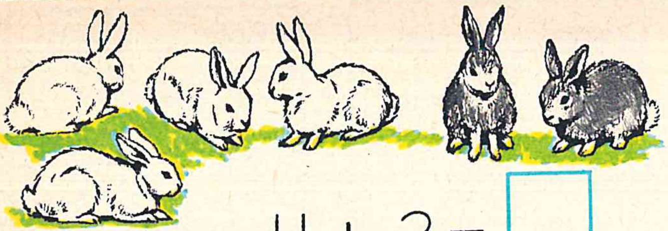
Seven plus two equals ________.

Six plus four equals ________.

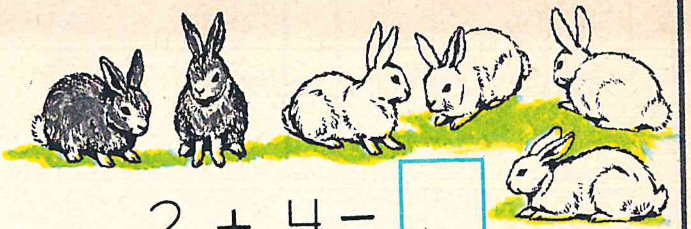
Three plus five equals ________.

Five plus two equals ________.

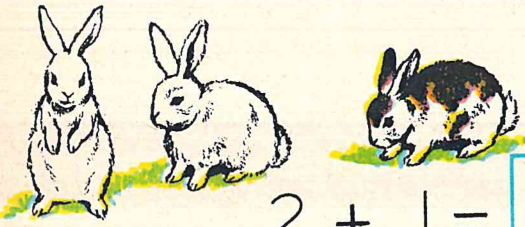
A



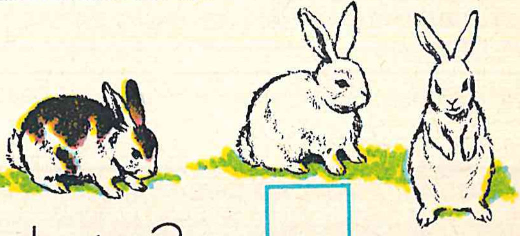
4 + 2 = ☐



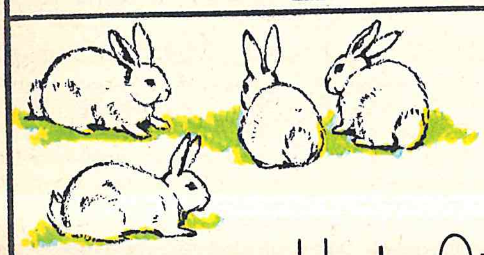
2 + 4 = ☐



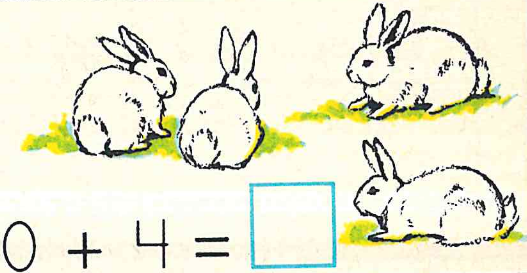
2 + 1 = ☐



1 + 2 = ☐



4 + 0 = ☐



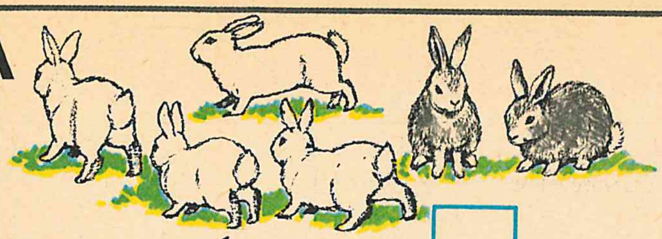
0 + 4 = ☐

B

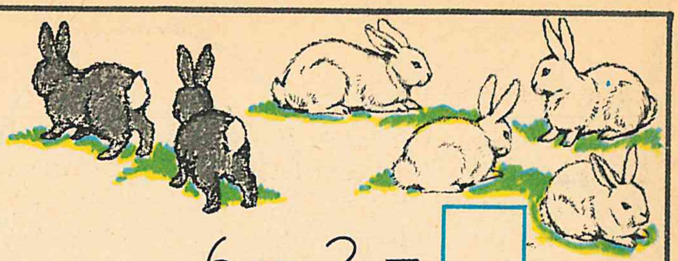
$\begin{array}{r} 6 \\ +1 \\ \hline \bigcirc \end{array}$	$\begin{array}{r} 1 \\ +6 \\ \hline \bigcirc \end{array}$	$\begin{array}{r} 2 \\ +0 \\ \hline \bigcirc \end{array}$	$\begin{array}{r} 0 \\ +2 \\ \hline \bigcirc \end{array}$	$\begin{array}{r} 8 \\ +2 \\ \hline \bigcirc \end{array}$	$\begin{array}{r} 2 \\ +8 \\ \hline \bigcirc \end{array}$
$\begin{array}{r} 4 \\ +\bigcirc \\ \hline 9 \end{array}$	$\begin{array}{r} 5 \\ +\bigcirc \\ \hline 9 \end{array}$	$\begin{array}{r} 5 \\ +\bigcirc \\ \hline 7 \end{array}$	$\begin{array}{r} 2 \\ +\bigcirc \\ \hline 7 \end{array}$	$\begin{array}{r} 0 \\ +1 \\ \hline \bigcirc \end{array}$	$\begin{array}{r} 1 \\ +0 \\ \hline \bigcirc \end{array}$

3 + 0 = ☐ 0 + 3 = ☐	6 + 2 = ☐ 2 + 6 = ☐	6 + 3 = ☐ 3 + 6 = ☐
7 + ☐ = 8 1 + ☐ = 8	6 + ☐ = 10 4 + ☐ = 10	0 + 0 = ☐ 0 + ☐ = 0

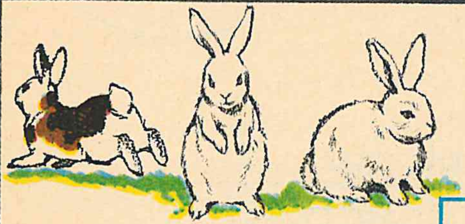
A



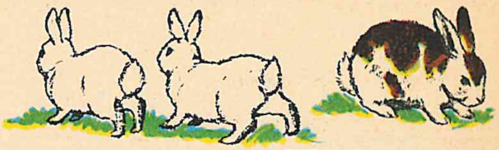
6 − 4 = ☐



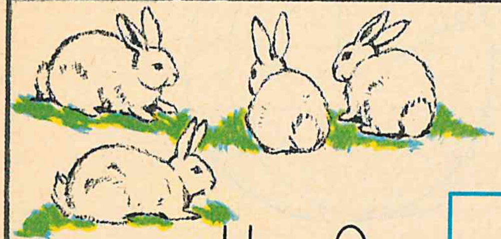
6 − 2 = ☐



3 − 1 = ☐



3 − 2 = ☐



4 − 0 = ☐

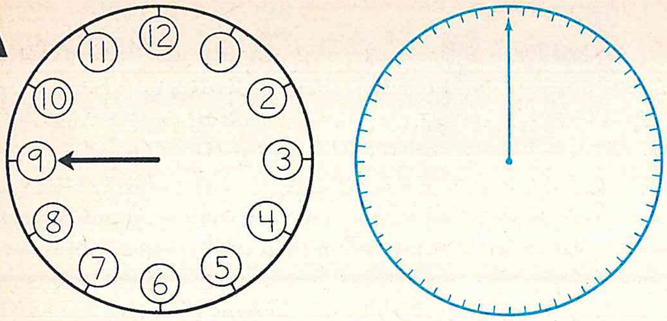
4 − 4 = ☐

B

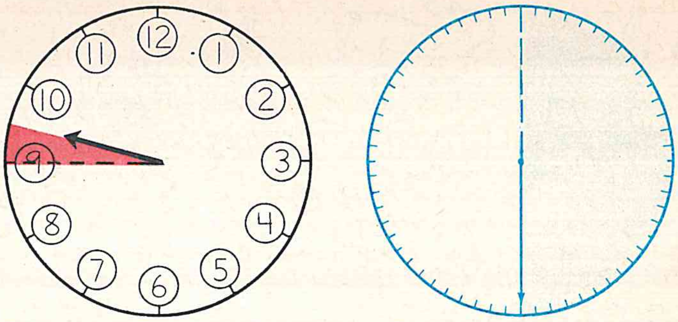
8 − 5 ○	8 − 3 ○	4 − 0 ○	4 − 4 ○	10 − 4 ○	10 − 6 ○
9 − ○ 7	9 − ○ 2	8 − ○ 2	8 − ○ 6	3 − 0 ○	3 − 3 ○

10 − 3 = ☐ 2 − 0 = ☐	9 − 3 = ☐ 1 − 0 = ☐	10 − 8 = ☐ 1 − 1 = ☐
0 − 0 = ☐ 7 − ☐ = 3	8 − ☐ = 4 9 − ☐ = 4	7 − ☐ = 2 10 − 6 = ☐

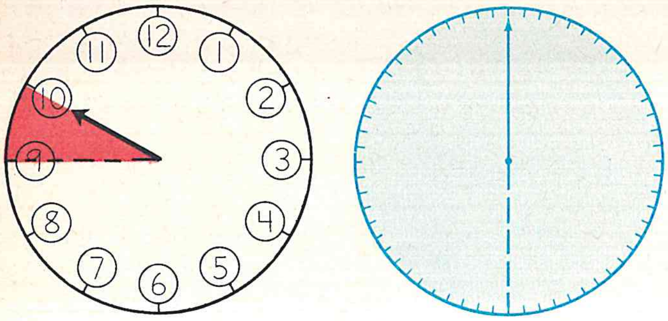
A



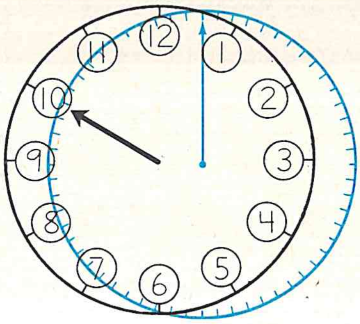
9 o'clock



Half past 9

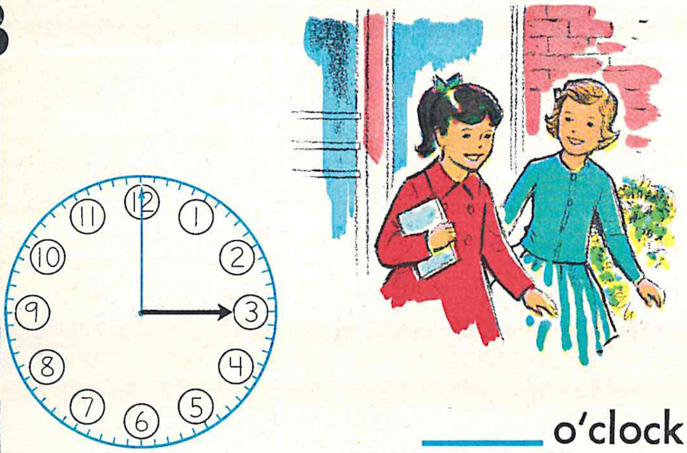


10 o'clock

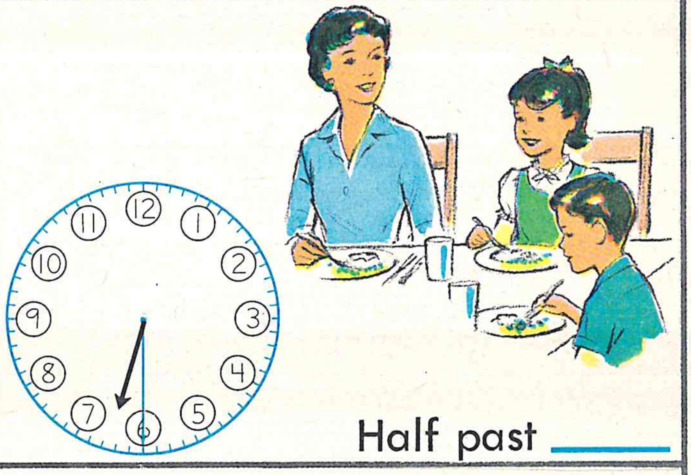


10 o'clock

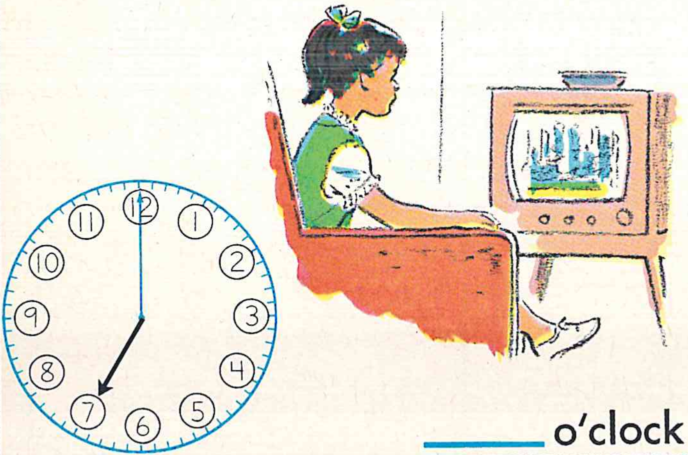
B



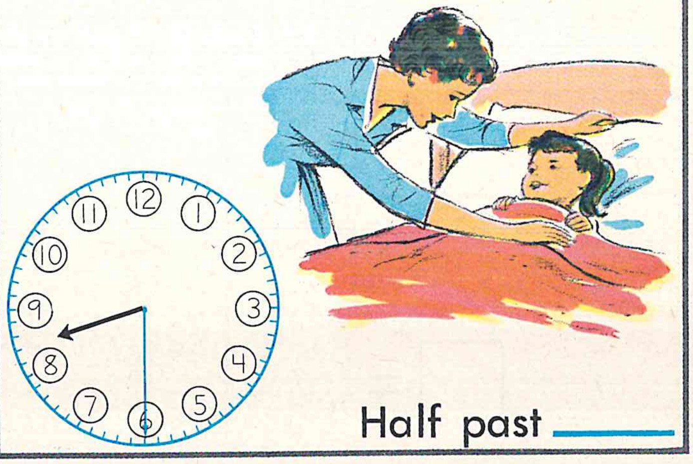
_____ o'clock



Half past _____

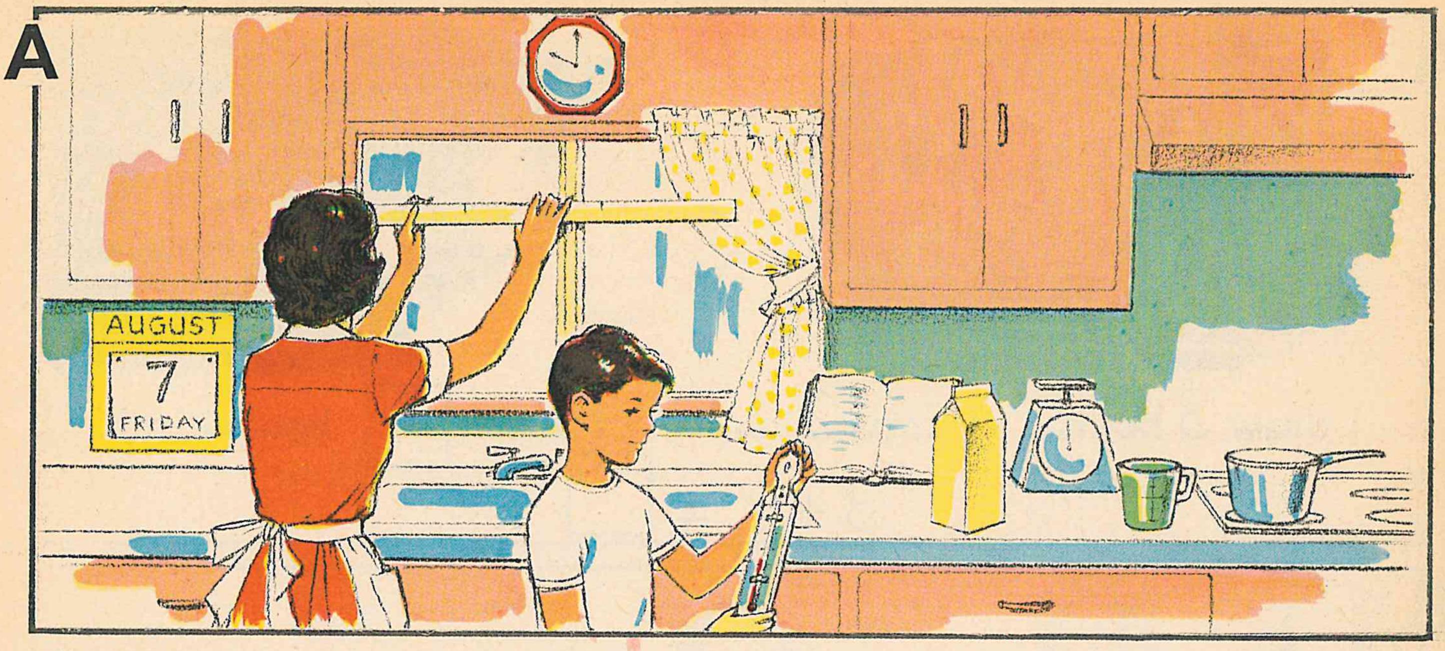


_____ o'clock

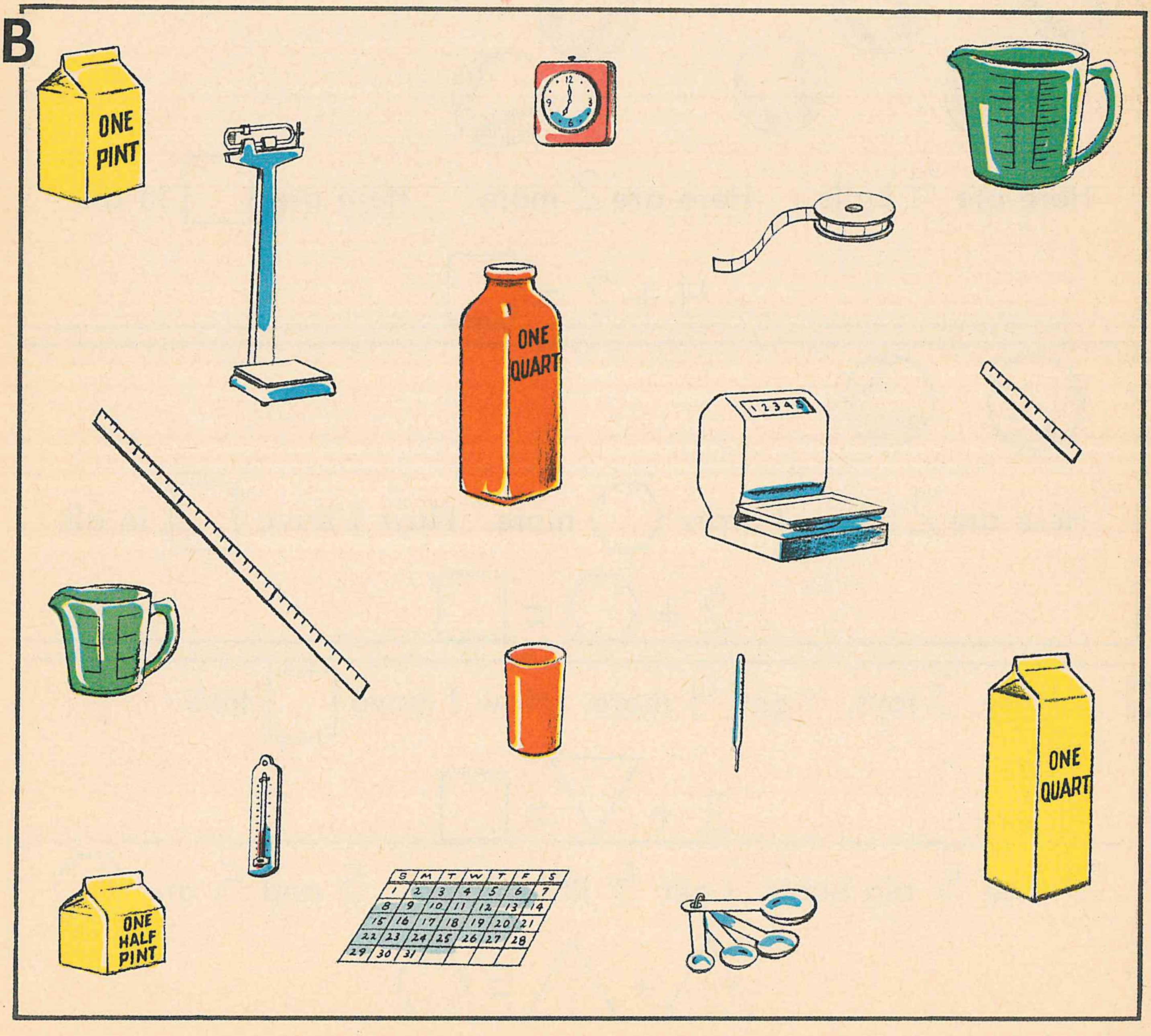


Half past _____

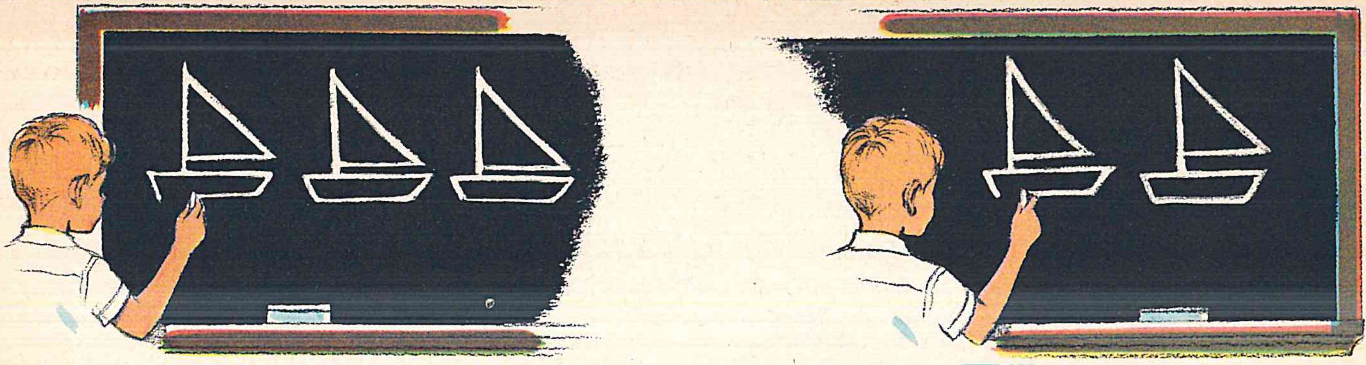
A


AUGUST
7
FRIDAY

B


ONE PINT
ONE QUART
1 2 3 4 5
S M T W T F S
1 2 3 4 5 6 7
8 9 10 11 12 13 14
15 16 17 18 19 20 21
22 23 24 25 26 27 28
29 30 31
ONE QUART
ONE HALF PINT

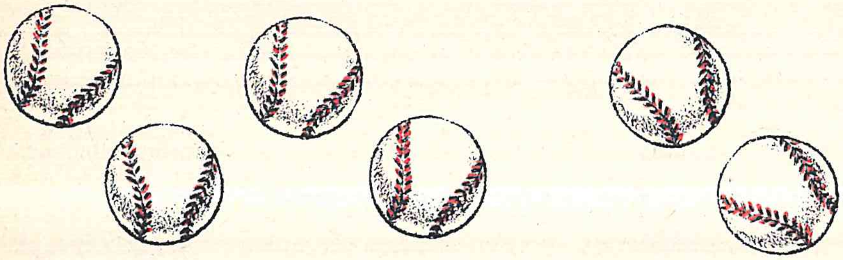
A



I draw 3 boats. I draw 2 more. I have □ boats in all.

3 + 2 = □

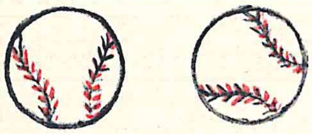
B



Here are 4 balls. Here are 2 more. Here are □ in all.

4 + 2 = □

C



Here are 2 balls. I draw ⬡ more. Now I have □ in all.

2 + ⬡ = □

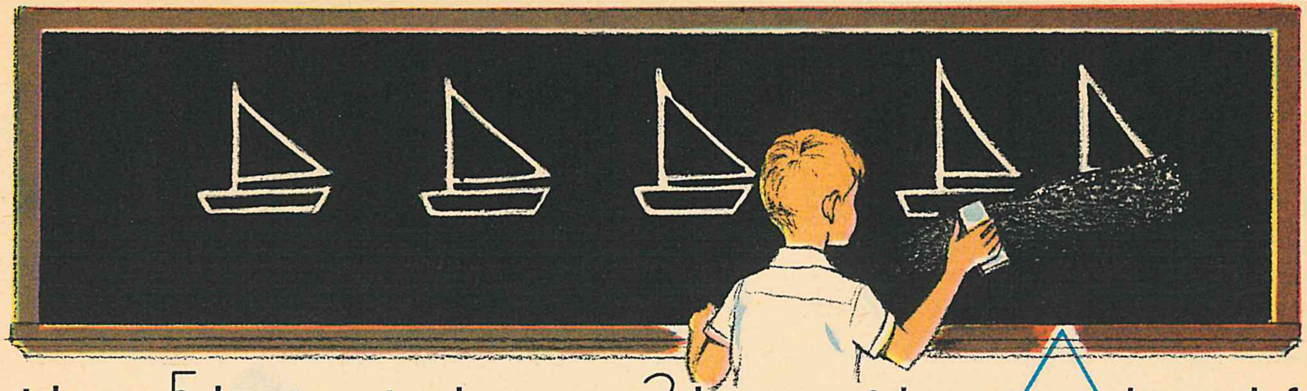
D I have 3 toys. I get 4 more. Now I have □ toys.

3 + ▽ = □

I have 5 big boats. I get 5 little boats. 5 and 5 are ⬡

△ + △ = ⬡

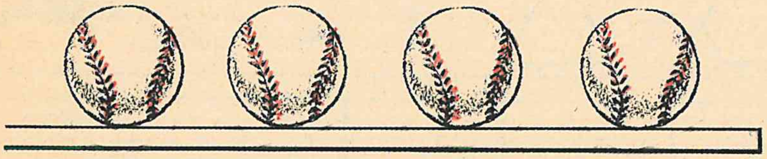
A



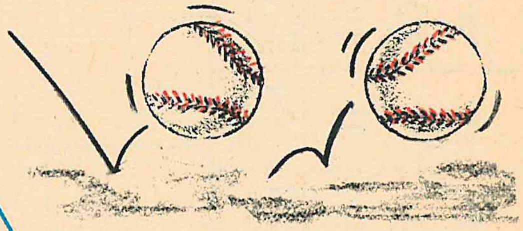
I have 5 boats. I take away 2 boats. I have △ boats left.

5 − 2 = △

B Here are 6 balls. 2 balls are going away.



How many will be left?



6 − 2 = △

C Here are 4 more balls. I put X on ⬡ balls. △ balls are left.

4 − ⬡ = △

D I have 7 toys. I put away 4 toys. △ are left.

7 − ▽ = △

I have 10 boats. I give away 5 boats. △ are left.

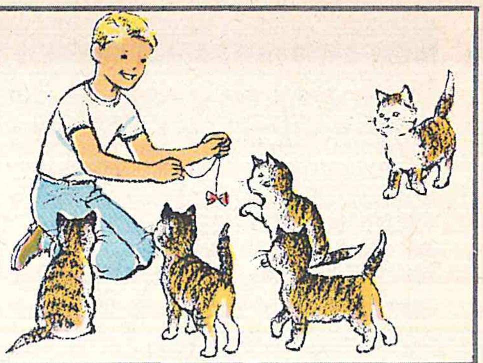
⬡ − △ = △

A Tom plays with four cats.

One more cat comes.

There are □ cats in all.

▽ + ⬡ = □



Dick has two airplanes.

Mother gives Dick three airplanes.

Now Dick has how many airplanes?

□ + ⬡ = △

B

8 + 2 = □

2 + 1 = □

1 + 3 = □

2 + 5 = □

1 + 6 = □

2 + 7 = □

8 + 1 = □

6 + 4 = □

5 + 1 = □

7 + 1 = □

5 + 3 = □

3 + 4 = □

1 + 2 ○	2 + 8 ○	3 + 8 ○	4 + 6 ○
1 + 8 ○	7 + 2 ○	1 + 4 ○	3 + 3 ○
2 + 4 ○	1 + 7 ○	6 + 1 ○	4 + 3 ○
3 + 2 ○	2 + 6 ○	4 + 5 ○	5 + 2 ○

6 + 2 = □

3 + 6 = □

5 + 4 = □

7 + 3 = □

4 + 2 = □

3 + 7 = □

5 + 5 = □

9 + 1 = □

4 + 4 = □

6 + 3 = □

3 + 5 = □

1 + 5 = □

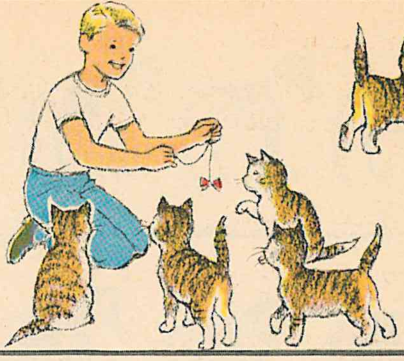
A

Tom plays with five cats.

One cat runs away.

How many are left?

□ − ⬡ = △

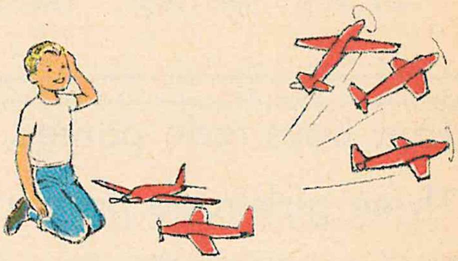


Dick has five airplanes.

Three fly away.

How many airplanes are left?

□ − ⬡ = △



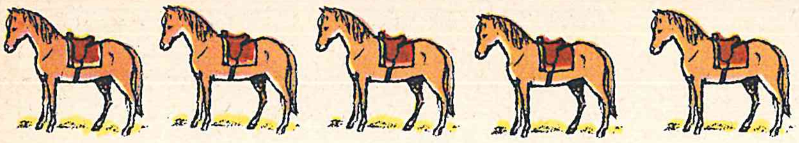
B

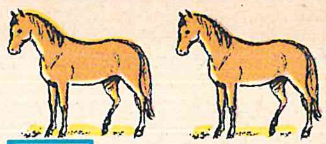
10 − 2 = □
3 − 1 = □
4 − 3 = □
7 − 5 = □
7 − 6 = □
9 − 7 = □
9 − 1 = □
10 − 4 = □
6 − 1 = □
8 − 1 = □
8 − 3 = □
7 − 4 = □

3 −2 ○	10 −8 ○	4 −1 ○	10 −6 ○
9 −8 ○	9 −2 ○	5 −4 ○	6 −3 ○
6 −4 ○	8 −7 ○	7 −1 ○	7 −3 ○
5 −2 ○	8 −6 ○	9 −5 ○	7 −2 ○

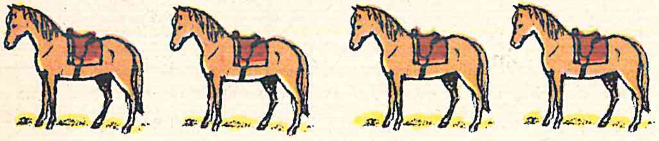
8 − 2 = □
9 − 6 = □
9 − 4 = □
10 − 3 = □
6 − 2 = □
10 − 7 = □
10 − 5 = □
10 − 1 = □
8 − 4 = □
9 − 3 = □
8 − 5 = □
6 − 5 = □

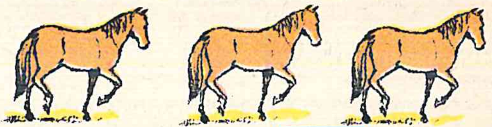
A





$\square + 2 = 7$





$7 - \square = 4$

B

Four boys rode ponies.

Three girls rode ponies.

How many children rode ponies?

$4 + 3 = \square$

Seven ponies were in a barn.

Seven ponies came out to play.

How many ponies were left in the barn?

7 − ⬡ = ▽

C

Seven ponies played.

Then six went to the barn.

How many were left?

□ − △ = ⬡

There were five big ponies and two little ponies.

How many ponies were there?

▽ + □ = ⬡

D

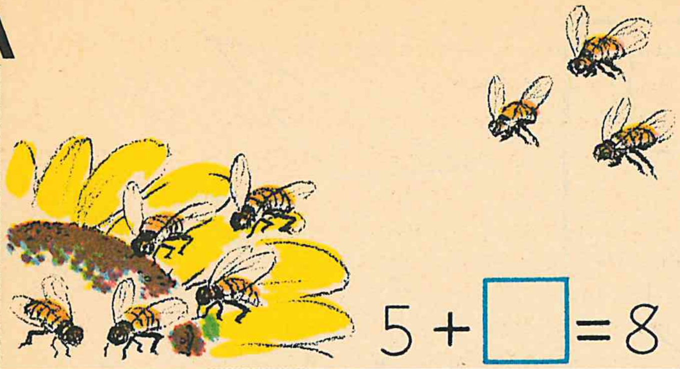
4	6	5	4	5	6
+3	−1	+2	−3	−2	+1
○	○	○	○	○	○

$7 - 2 = \square$ $\quad 3 + 4 = \square$ $\quad 7 - 0 = \square$

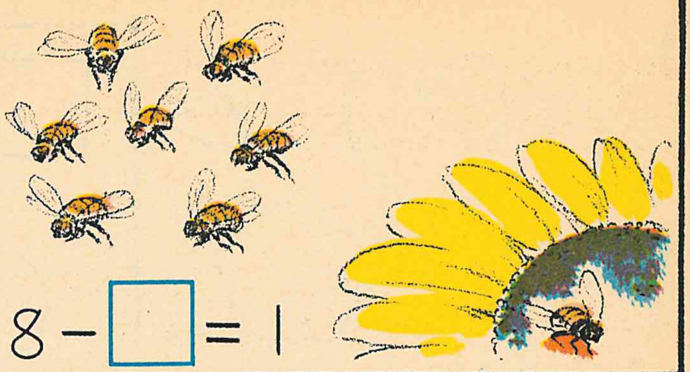
$7 - \square = 3$ $\quad \square + 7 = 7$ $\quad \square - 2 = 5$

$1 + \square = 7$ $\quad 7 - 3 = \square$ $\quad \square - 7 = 0$

A



5 + ☐ = 8



8 − ☐ = 1

B

There were eight bees on a flower. No more came. There were still ______.

▽ + ☐ = ▽

Eight bees were on a flower. One flew away. Then there were ______.

☐ − △ = ⬡

C

4	5	4	6	5	6
+4	−3	−4	+2	+3	−2
○	○	○	○	○	○

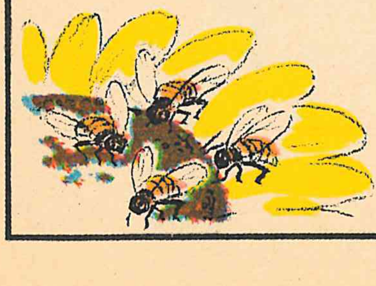
D

8 − 8 = ☐ 2 + ☐ = 8 ☐ + 7 = 8

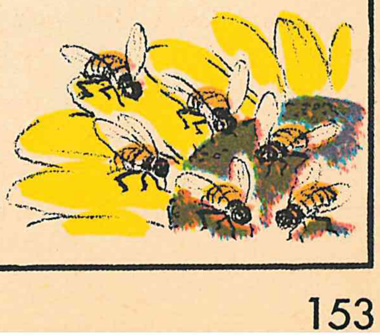
8 + 2 = ☐ 7 − ☐ = 3 ☐ − 5 = 5

☐ − 0 = 8 ☐ − 4 = 4 0 + ☐ = 8

E

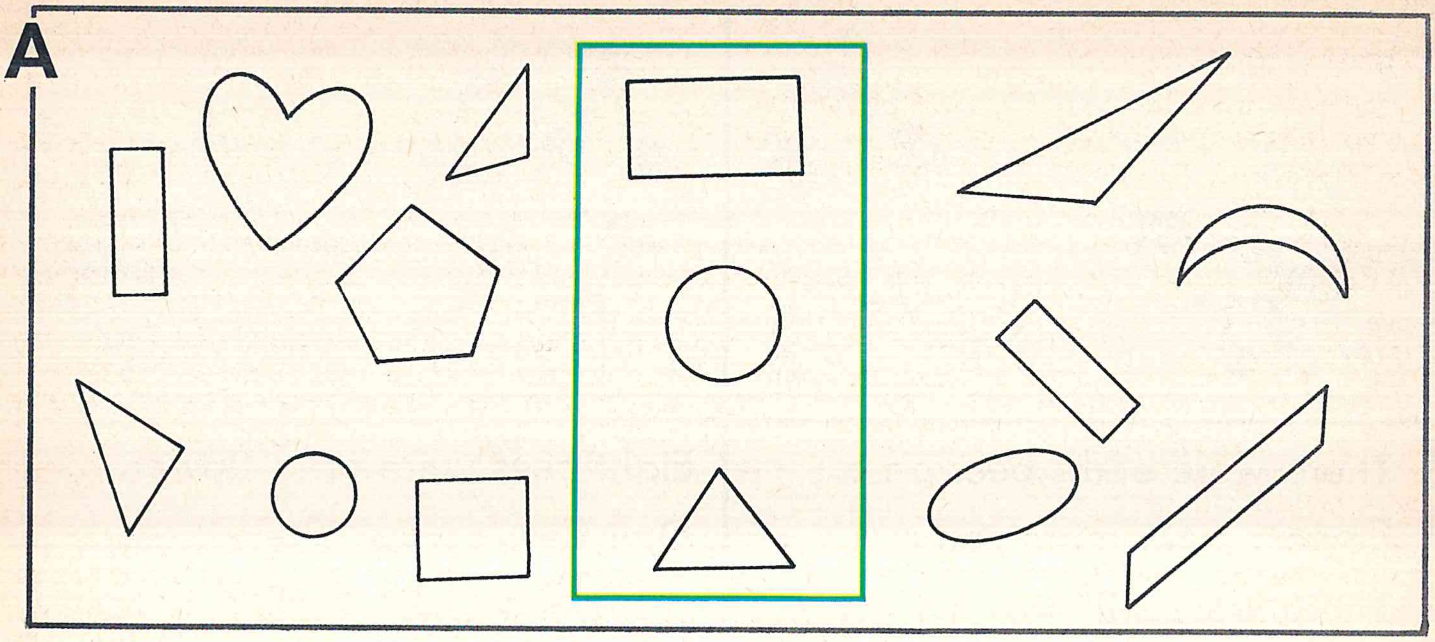


4 + ☐ = 8

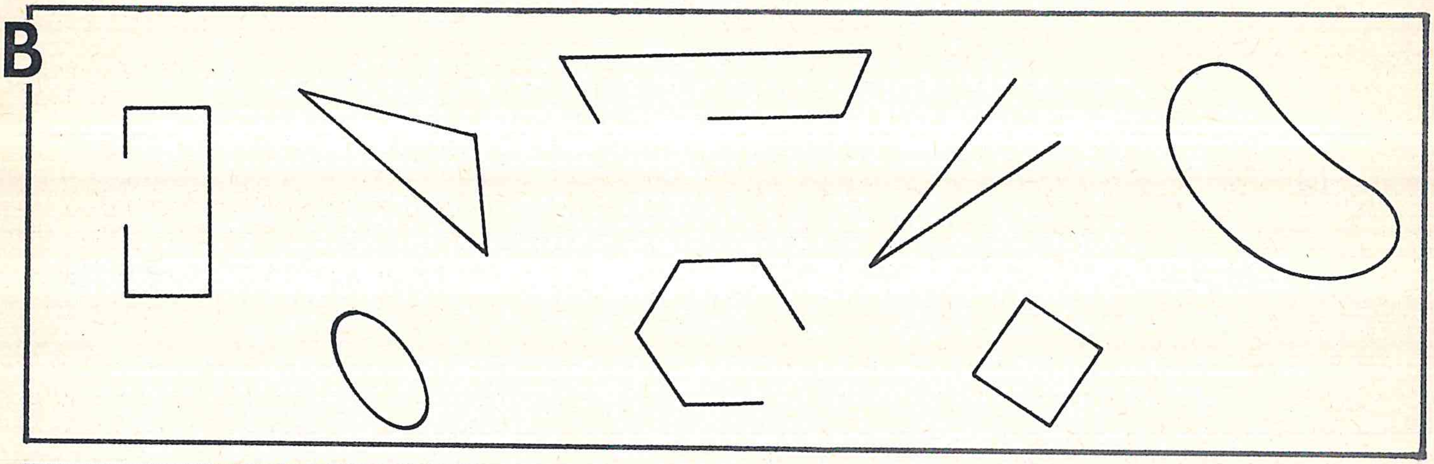


8 − ☐ = 6

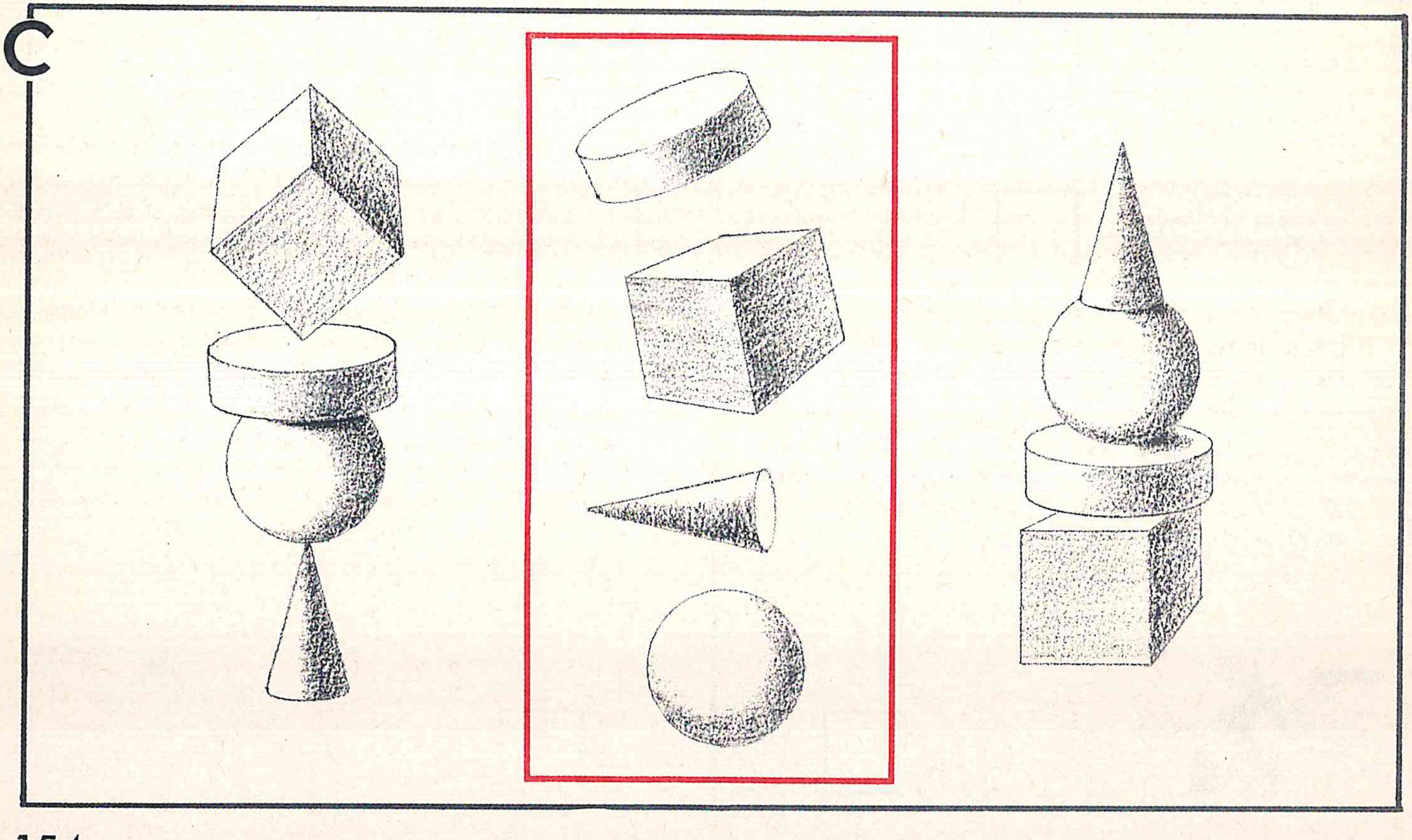
A



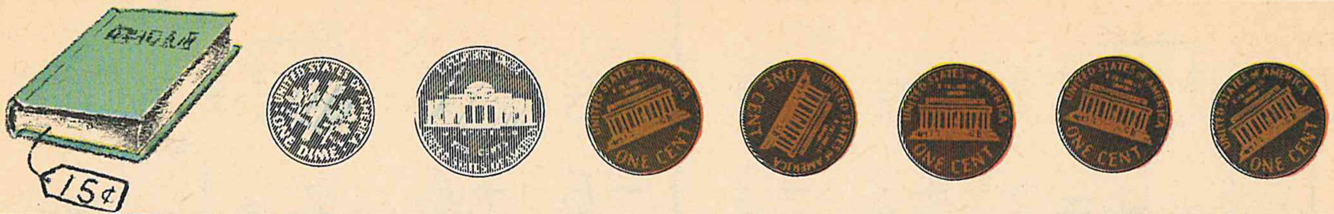
B

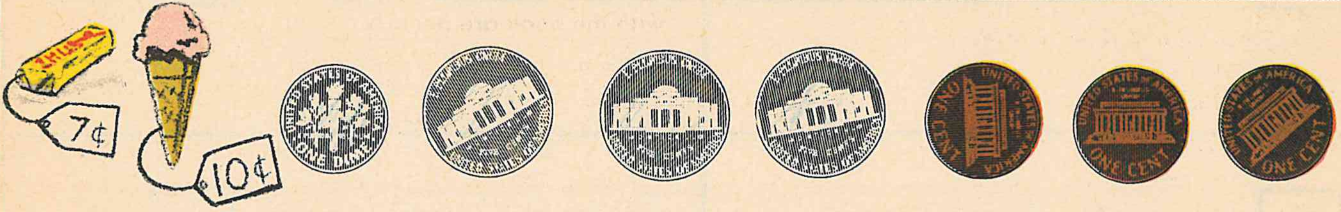


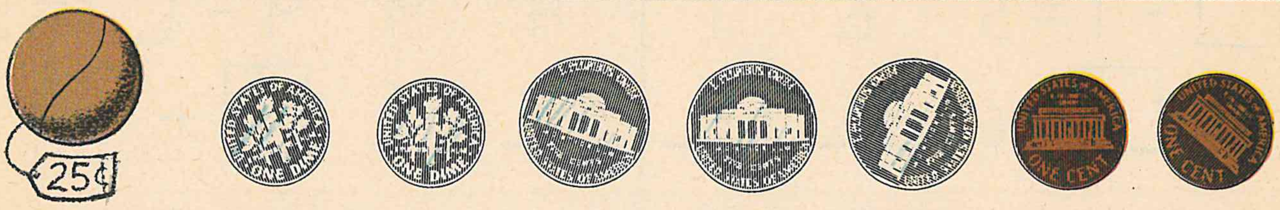
C

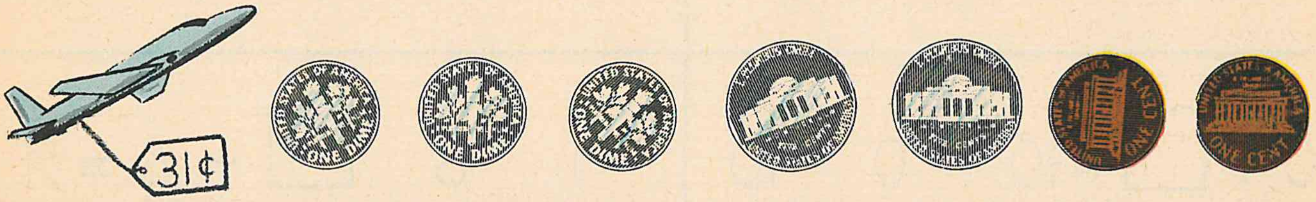


A

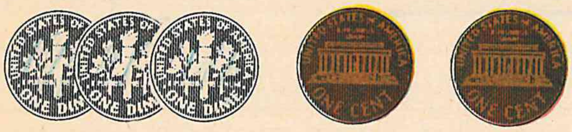




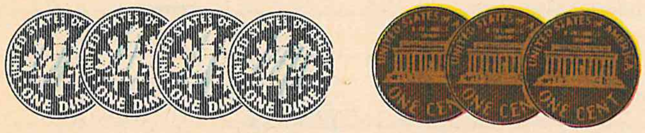




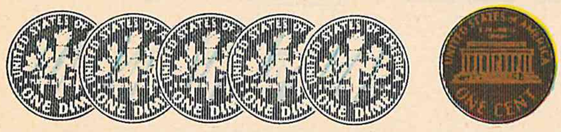
B



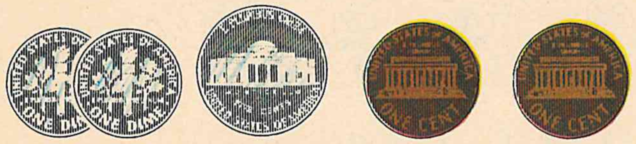
___¢



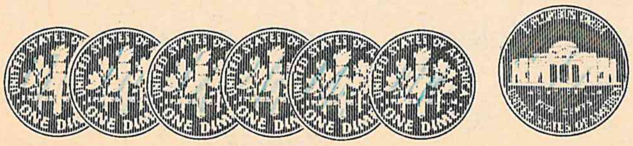
___¢



___¢



___¢



___¢

C

82¢ = 80¢ + 2¢

47¢ = 40¢ + ___¢

56¢ = ___¢ + 6¢

39¢ = ___¢ + ___¢

75¢ = ___¢ + ___¢

A

3 + ☐ = 7

☐ − 4 = 3

$$\begin{array}{r}4\\+3\\\hline\bigcirc\end{array}\qquad\begin{array}{r}7\\-3\\\hline\bigcirc\end{array}$$

$$\begin{array}{r}8\\-6\\\hline\bigcirc\end{array}\qquad\begin{array}{r}2\\+6\\\hline\bigcirc\end{array}$$

☐ + 2 = 8

8 − ☐ = 6

☐ − 1 = 5

5 + ☐ = 6

$$\begin{array}{r}6\\-5\\\hline\bigcirc\end{array}\qquad\begin{array}{r}1\\+5\\\hline\bigcirc\end{array}$$

$$\begin{array}{r}4\\+5\\\hline\bigcirc\end{array}\qquad\begin{array}{r}9\\-5\\\hline\bigcirc\end{array}$$

9 − ☐ = 5

☐ + 4 = 9

10 + ☐ = 10

☐ − 0 = 10

$$\begin{array}{r}0\\+10\\\hline\bigcirc\end{array}\qquad\begin{array}{r}10\\-10\\\hline\bigcirc\end{array}$$

$$\begin{array}{r}9\\-1\\\hline\bigcirc\end{array}\qquad\begin{array}{r}8\\+1\\\hline\bigcirc\end{array}$$

☐ + 8 = 9

9 − ☐ = 1

☐ − 2 = 8

8 + ☐ = 10

$$\begin{array}{r}10\\-8\\\hline\bigcirc\end{array}\qquad\begin{array}{r}2\\+8\\\hline\bigcirc\end{array}$$

$$\begin{array}{r}3\\+5\\\hline\bigcirc\end{array}\qquad\begin{array}{r}8\\-5\\\hline\bigcirc\end{array}$$

8 − ☐ = 5

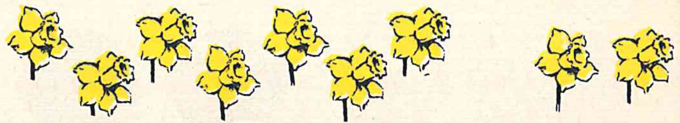
☐ + 3 = 8

B

Tim had 9 apples.

Tim gave Bob 3 apples.

Now Tim has ☐ apples.



Jack had 7 flowers.

He picked 2 more flowers.

Now Jack has ☐ flowers.

A

☐ − 2 = 3

$$\begin{array}{r}3\\+2\\\hline\end{array}\quad\begin{array}{r}5\\-3\\\hline\end{array}\quad\begin{array}{r}2\\+3\\\hline\end{array}$$

○ ○ ○

10 − ☐ = 4

$$\begin{array}{r}4\\+6\\\hline\end{array}\quad\begin{array}{r}10\\-4\\\hline\end{array}\quad\begin{array}{r}6\\+4\\\hline\end{array}$$

○ ○ ○

9 − 2 = ☐

$$\begin{array}{r}7\\+2\\\hline\end{array}\quad\begin{array}{r}9\\-7\\\hline\end{array}\quad\begin{array}{r}2\\+7\\\hline\end{array}$$

○ ○ ○

6 − ☐ = 2

$$\begin{array}{r}2\\+4\\\hline\end{array}\quad\begin{array}{r}6\\-2\\\hline\end{array}\quad\begin{array}{r}4\\+2\\\hline\end{array}$$

○ ○ ○

4 − 0 = ☐

$$\begin{array}{r}0\\+4\\\hline\end{array}\quad\begin{array}{r}4\\-4\\\hline\end{array}\quad\begin{array}{r}4\\+0\\\hline\end{array}$$

○ ○ ○

☐ − 3 = 6

$$\begin{array}{r}6\\+3\\\hline\end{array}\quad\begin{array}{r}9\\-6\\\hline\end{array}\quad\begin{array}{r}3\\+6\\\hline\end{array}$$

○ ○ ○

10 − 7 = ☐

$$\begin{array}{r}3\\+7\\\hline\end{array}\quad\begin{array}{r}10\\-3\\\hline\end{array}\quad\begin{array}{r}7\\+3\\\hline\end{array}$$

○ ○ ○

☐ − 2 = 5

$$\begin{array}{r}5\\+2\\\hline\end{array}\quad\begin{array}{r}7\\-5\\\hline\end{array}\quad\begin{array}{r}2\\+5\\\hline\end{array}$$

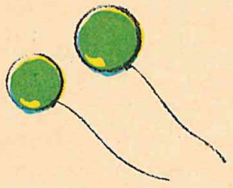
○ ○ ○

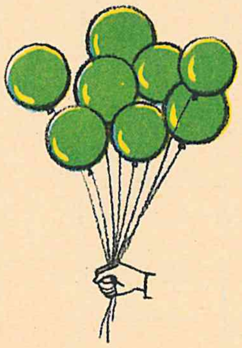
10 − ☐ = 9

$$\begin{array}{r}9\\+1\\\hline\end{array}\quad\begin{array}{r}10\\-9\\\hline\end{array}\quad\begin{array}{r}1\\+9\\\hline\end{array}$$

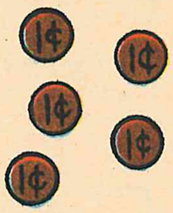
○ ○ ○

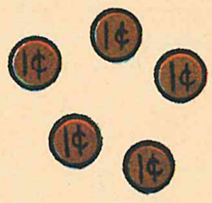
B





I had 10 balloons.
I lost 2 balloons.
I have ☐ balloons now.





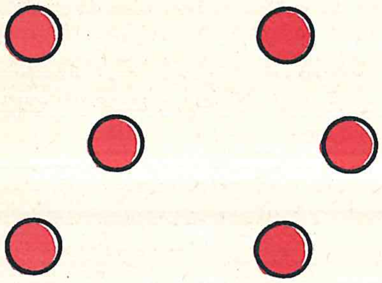
Betty had 5 pennies.
Father gave her 5 pennies.
Now she has ☐ pennies.

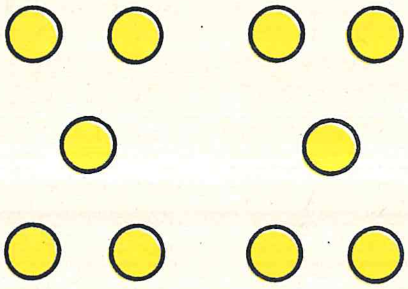
A

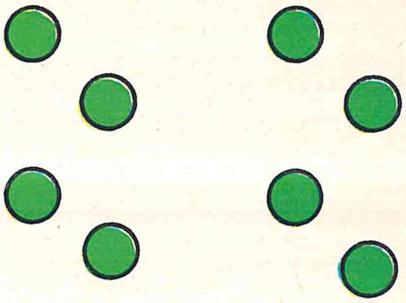
$$\begin{array}{r} 2 \\ +4 \\ \hline \end{array}\qquad \begin{array}{r} 5 \\ +4 \\ \hline \end{array}\qquad \begin{array}{r} 6 \\ +3 \\ \hline \end{array}\qquad \begin{array}{r} 3 \\ +5 \\ \hline \end{array}\qquad \begin{array}{r} 2 \\ +7 \\ \hline \end{array}\qquad \begin{array}{r} 1 \\ +8 \\ \hline \end{array}$$

$$\begin{array}{r} 4 \\ +5 \\ \hline \end{array}\qquad \begin{array}{r} 3 \\ +6 \\ \hline \end{array}\qquad \begin{array}{r} 4 \\ +2 \\ \hline \end{array}\qquad \begin{array}{r} 7 \\ +2 \\ \hline \end{array}\qquad \begin{array}{r} 1 \\ +8 \\ \hline \end{array}\qquad \begin{array}{r} 5 \\ +3 \\ \hline \end{array}$$

B







☐ + ☐ = 6

⬡ + ⬡ = 10

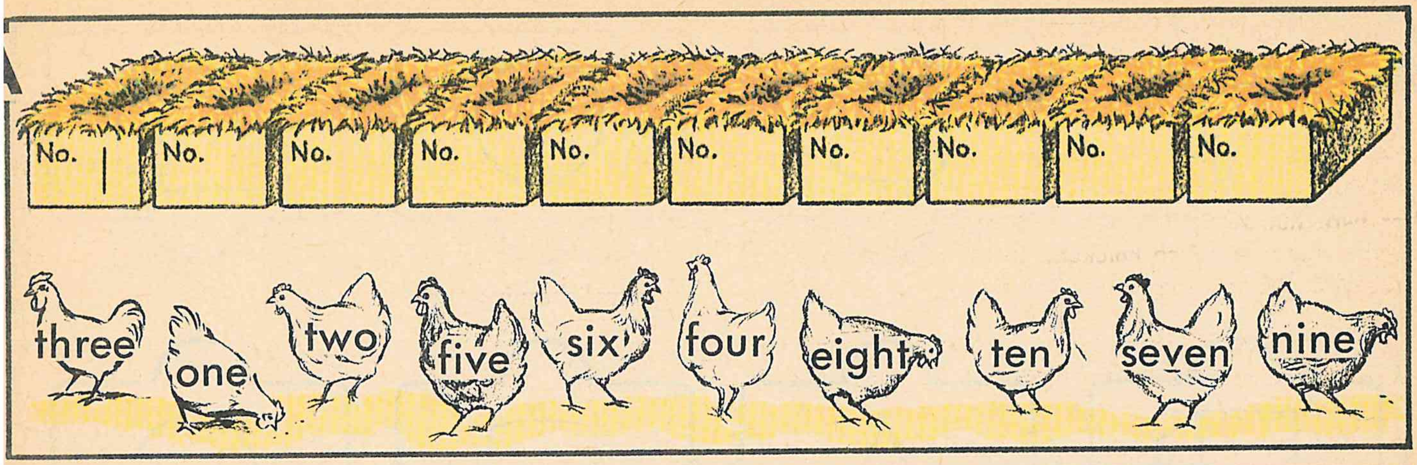
△ + △ = 8

C

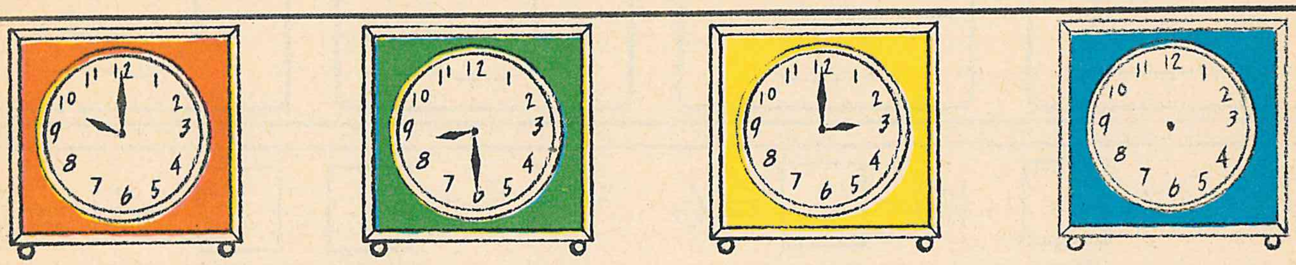
$$\begin{array}{r} 7 \\ -1 \\ \hline \end{array}\qquad \begin{array}{r} 6 \\ -4 \\ \hline \end{array}\qquad \begin{array}{r} 8 \\ -1 \\ \hline \end{array}\qquad \begin{array}{r} 9 \\ -4 \\ \hline \end{array}\qquad \begin{array}{r} 7 \\ -3 \\ \hline \end{array}\qquad \begin{array}{r} 5 \\ -2 \\ \hline \end{array}$$

$$\begin{array}{r} 6 \\ -2 \\ \hline \end{array}\qquad \begin{array}{r} 7 \\ -6 \\ \hline \end{array}\qquad \begin{array}{r} 8 \\ -7 \\ \hline \end{array}\qquad \begin{array}{r} 5 \\ -3 \\ \hline \end{array}\qquad \begin{array}{r} 9 \\ -5 \\ \hline \end{array}\qquad \begin{array}{r} 7 \\ -4 \\ \hline \end{array}$$

A

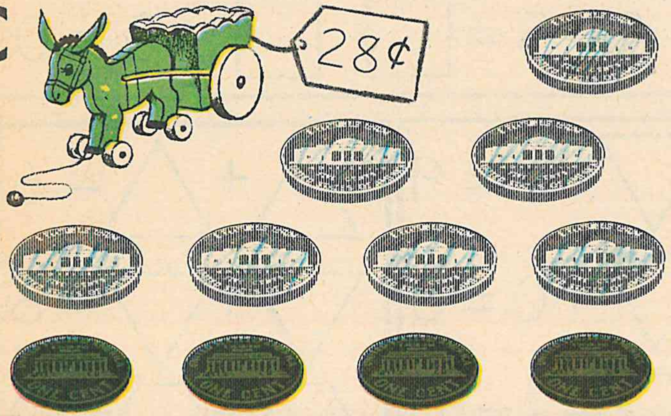


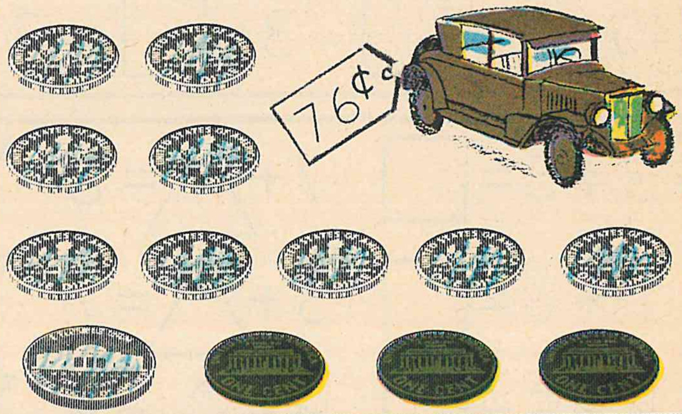
B



____ o'clock Half past ____ ____ o'clock Half past 4

C





D

I have five cats.
Four cats run away.
____ cat is left.

5 − △ = □

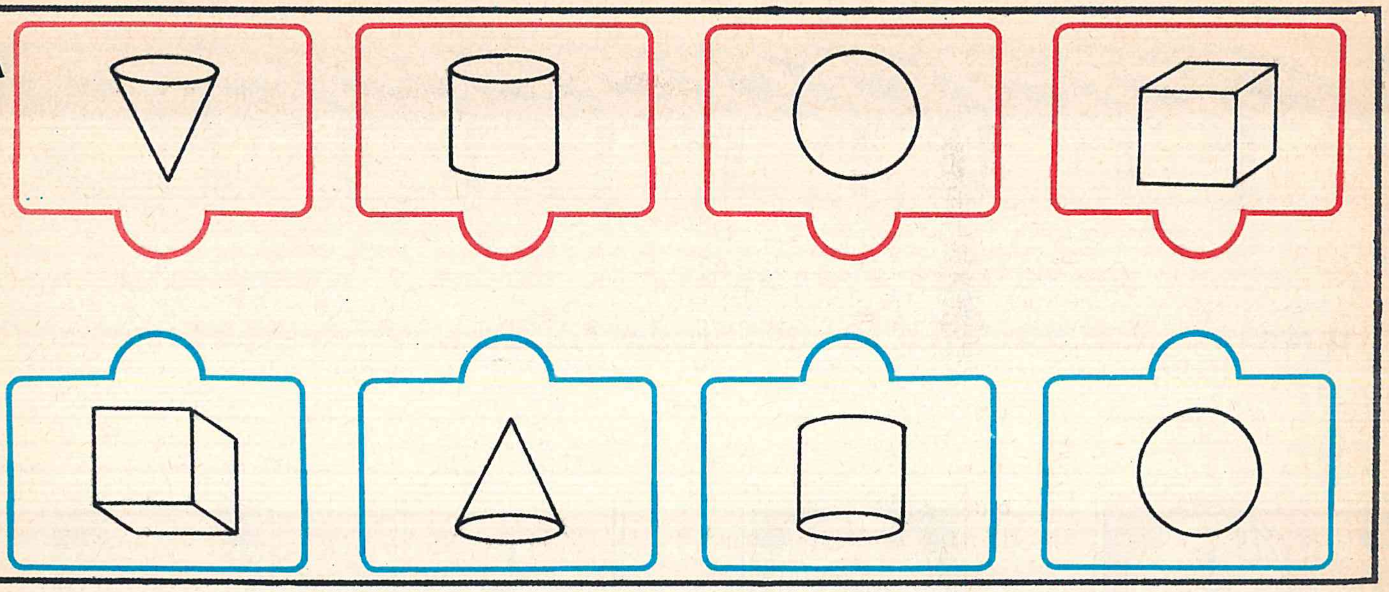
Tom has seven toys.
Mother gives him three toys.
Now Tom has ____ toys.

7 + ▽ = □

E

6	5	6	4	5	4
−2	+3	+2	−4	−3	+4
○	○	○	○	○	○

A



B

$7-3=\square$ $10-\square=6$ $9-5=\square$ $\square-4=0$

$6-2=\square$ $8-\square=4$ $5-0=\square$ $\square-2=7$

$10-7=\square$ $3-\square=3$ $8-5=\square$ $\square-0=0$

C

$3+5=\square$ $7+\triangle=8$ $\bigtriangledown+1=9$

$1+0=\square$ $3+\triangle=7$ $\bigtriangledown+0=0$

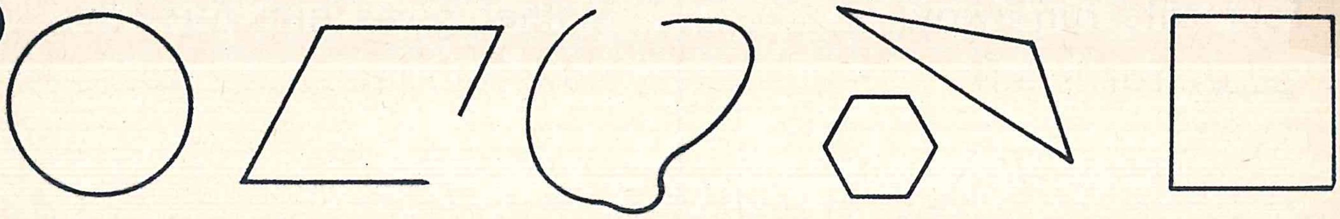
$4+5=\square$ $9+\triangle=9$ $\bigtriangledown+7=10$

$\triangle+\triangle=6$

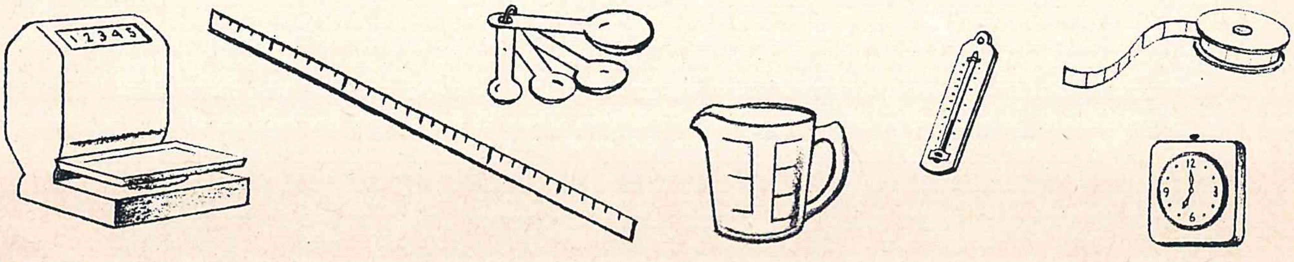
$\bigtriangledown+\bigtriangledown=8$

$\text{⬡}+\text{⬡}=10$

D



E



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NAME ______________________________

CHARLES E. MERRILL BOOKS, INC.
1300 Alum Creek Drive Columbus 16, Ohio